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PLAYER

SIMULATION ADVENTURE STRATEGY

FEATURED IN THIS ISSUE:

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FRONTIER: ELITE II

STONEKEEP

V FOR VICTORY IV

Discover from an
ex-RAF pilot with
over 17 years of
flying experience what
the best
Flight Simulation
on the market
has to offer in
terms of realism

AIR COMBAT SIMULATION

SUPER TEST:

10 OF THE BEST FLIGHT SIMS

TESTED AND RATED

Ocean's amazing TFX
(page 26) proves to be
one of the most
stunning fighter
combat simulations
released this year

TFX

THE FUTURE OF FLIGHT SIMULATIONS?

PC Player
Issue One
December 1993
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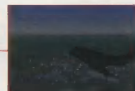
COMPETITION

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PAGE 63

If you're a fan of war games, you'll love our competition. Electronic Arts has kindly donated the complete V for Victory series of games, and all you have to do is answer a ridiculously simple question and the package could be yours



PAGE 26

TFX is the stunning new flight and fight sim from DHD. Take on the role of a UN pilot flying the new, and as yet unproven, European Fighter Aircraft in some of the world's most politically unsound trouble spots

PAGE 24

Have you ever seen the films Memphis Belle and Air America? If you have, then it's a fair bet that you'll have marvelled at the flying sequences and aerial trickery that went on. The company responsible for the stunts in both of those films goes by the name of the Old Flying Machine Company, and we went down there for a chat with the man in charge, Mark Hanna



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THE game of the early eighties. Elite appeared on nearly every format, originally surfacing on the old BBC micro, and games such as Wing Commander owe it a huge debt. The release of Elite II is imminent, but how does it compare to the original?

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X-Wing, the definitive space combat simulation, comes under the spotlight this month with an in-depth guide on how, why, where and when. Everything you ever wanted to know about flying an X-Wing but were too scared to ask is revealed and explained, including how to defeat the Death Star



PLAYERS' GUIDES

X-WING

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PC PLAYER • ISSUE ONE • DECEMBER 1992 • £2.95

pc PLAYER

SIMULATION ADVENTURE STRATEGY

THE only magazine for enthusiasts

FEATURES IN THIS ISSUE:

- PREVIEW
- FLIGHT SIMULATOR 2.0
- FRONTIER: ELITE II
- STONEKEEP
- V FOR VICTORY IV

Discover how to fly your first solo mission in the new Elite II game. The new Stonekeep and the new V for Victory IV. The new flight simulator 2.0. The new flight simulator 2.0. The new flight simulator 2.0.

AIR COMBAT SIMULATION

SUPER TECH

10 OF THE BEST FLIGHT SIMS

TESTED AND RATED

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TFX

THE FUTURE OF FLIGHT SIMULATIONS?

SIMULATION • ADVENTURE • STRATEGY

This month's cover image is taken from an original photograph intended for use in an information brochure from Lockheed regarding the F-22 Superstar fighter aircraft

WELCOME TO PC PLAYER

PC Player is a magazine designed specifically to cater for people who take their PC games seriously. We'll be aiming our editorial at those of you who love adventures, simulations, strategy games and role-playing games. Our

stuff, we've endeavoured to create a publication which tells you all you could possibly want to know about state-of-the-art PC entertainment. We've spoken to experts in every conceivable field to assist us in our research, and as a result have managed to secure the

"YOU DON'T BUY A PC TO PLAY ARCADE GAMES OR CONSOLE CONVERSIONS - THE PC IS THE ONLY MACHINE FOR IN-DEPTH SIMULATIONS AND LEADING-EDGE ENTERTAINMENT"

philosophy right from the start has been that you don't buy a PC to play arcade games or console conversions - the PC is the only machine for in-depth simulations and is at the leading-edge of entertainment.

By putting together a team of writers and consultants who really know their

help of fighter pilots, role-playing experts, flying tutors and even a chess Grand Master. Each month we'll be calling on these experts to ensure that we have the most authoritative reviews and features which provide you with information gleaned from all possible sources to give every perspective.

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STARFLEET ACADEMY - REBEL

ASSAULT - POLICE QUEST 4 - ARCHON

ULTRA - LORDS OF MIDNIGHT III -

FALCON 4.0 - ACES OF THE DEEP

PC PLAYER NEWS

PAGE 3

IT'S coming! The most eagerly awaited sequel in role-playing history is due for release in time for Christmas, thanks to Interplay. It's been four years in the making, but from the time we've managed to spend with the product, it's certainly shaping up to be a worthy successor.

Boasting pretty incredible artificial intelligence as well as some wonderful new characters, the game takes the amazing DM engine into a new realm. You may have read snippets elsewhere and there are bound to be plenty of questions you're longing to ask about **DUNGEON MASTER II**, so we shall try and cover the queries most frequently asked...

Yes, it is a 256 colour game this time around, and it's a 'step' scroller rather than the currently rather trendy Underworld-type game. It is bigger than the first (it's about four times bigger in fact) and yes, it has outside bits as well as dungeon sections. The control method has hardly been tampered with and anyone fanatical about the original should take a shine to DMI's simple to use interface.

Dungeon Master II:
The Legend of
Skullkeep
- Interplay



Possibly the most impressive factor contributing to DMI's novelty is the intelligence of the bad guys. Many RPGs have boasted decent AI routines, but DMI has enemies that will plot together, team up, ambush and run away from you. Characters will even throw things back at you after you've hit them!

It's always a pleasure to discover that a new Star Wars game from LucasArts is closer to release than you thought. **REBEL ASSAULT** is currently in the final stages of development, and to be quite honest with you it's one of the most wonderful-looking games we've ever seen. Admittedly the fact that the words 'Star Wars' often generate a state of euphoria in the office may have something to do with it - but if you've had a chance to see anything on Rebel Assault (such as the demo on the Day of the Tentacle CD), I'm sure you'll agree that it really is fabulous.

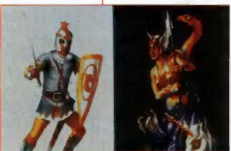
Due for release in the third week of November, Rebel Assault could turn out to be the next 'must have' game for PC CD.

Who remembers Archon then?

Come on, who remembers the original released by Ariolasoft all those years ago on the C64? Now the classic strategy board game hits the PC with enhanced graphics and a plethora of new features.

In **ARCHON ULTRA**, do battle with unicorns, banshees, dragons,

Archon Ultra -
US Gold/SSI



Rebel Assault -
US Gold/LucasArts



Basilisk and Golems as you fight for domination of the game board in this bastardisation of chess.

US Gold is intending to launch the enhanced Archon in time for Christmas, and from what we've seen of the specs it looks as though it's intended to support just about every sound board in the known universe, including the kind of all sound boards, the Gravis Ultrasound.

FANTASY EMPIRES, also due from SSI at the same time, is dubbed as the very first D&D game to feature a computer dungeon master who mediates all elements of play.

Designed for play by up to five players, Fantasy Empires attempts to recreate the magic of true role-playing in a different way to any other PC game.

NEWS



Although we've seen very little of the product at present, it will be very interesting to see if SSI manages to create the desired effect.

● **THE ELДАР SCROLLS** is described by Bethesda as being one of the most revolutionary role-playing games ever. Heard that before? Really?! However, for a change someone may actually have something worth shouting about. RPGs are definitely going through a graphic revolution at the moment, with titles such as *Twin Dolphin's Forgotten Castle* and Interplay's *Stonekeep* taking the techniques used in *Underworld* one step further. *Eldar Scrolls* is yet another impressive-looking RPG ready to knock the socks off anyone who catches a glimpse of it.

As you'd expect, it has all the latest animation and graphics scaling techniques well and truly sewn up, and from what we've seen it also has some fairly revolutionary gameplay features. Take the Spellmaker option for example. Apparently you can take any spell from within the game and mix it with another to create different effects. The developers were briefed to produce a role-player in which freedom was of paramount importance and the result of this should definitely be worth seeing.

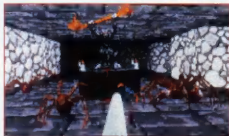
Specified at present as a 396 minimum product, don't be surprised if *Eldar Scrolls* looks crap on anything less than a 486.

DELTA V is the latest in the current trend of lovely-looking fast-action 3D games. Dubbed as a Cyberpunk net-running sort of thing, the game is basically a 'lots of bitmapped polygons moving really fast' sort of thing. Original? Maybe not. The pre-launch hype waffles a fair amount about virtual reality, which isn't always a good sign. Never mind though, it does have a fairly novel link-up facility which apparently allows up to six people to play together. Sounds like it could be worth taking a look at. Watch out for an early '94 release.

● Mindscape is currently busily beavering away in order to bring us an assortment of products just

Evasive Action - Mindscape

in time for Christmas. First up we have the rather novel flight sim, **EVASIVE ACTION**. Designed to be far more entertaining than many of the complex sims on the market, *Evasive Action* concentrates on one-on-one dogfighting and offers an interesting variety of options.



(Left) *The Elder Scrolls*, (Right) *Delta V - US Gold/Bethesda Softworks*

Players can choose to fly in four different time zones - WWI, WWII, the present day or in the distant future. Each time zone offers appropriate vehicles to use in combat, with biplanes and spitfires in the past, to modern jets and high-speed spacecraft equipped with lasers and missiles.

Although many combat sims offer two-player options, *Evasive Action* has been designed with this feature far more prominent than most. Players can link up via a modem or null link, or alternatively a split-screen, two-player option allows two to play on the same machine.

Although flight physics and models are far from accurate, the game seems to be both original and entertaining. Watch for a release in November.

● The **STAR TREK** series of games from Interplay is set to vastly expand over the next few months as a whole range of products hits the market. First up (ready as you read this) is the enhanced version of **25th ANNIVERSARY** which utilises the features offered by the Sierra Semiconductor Aria Listener sound card. Record numerous commands for the game to learn and then control all functions from the Enterprise bridge by simply speaking into a mic. A definite must if you've got the card but have no games for it.

Another enhancement for 25th Anniversary appears in the form of a CD enhanced version that has voices recorded by the original cast especially for the game. This has to be a definite Trekkie essential purchase if ever there was one. Watch for the disc version in the shops at the beginning of November.



As far as new Trekkie games go, Interplay has two new titles up its sleeve. First, the 'no big surprise' **STAR TREK 2, JUDGEMENT RITES**. Much larger in size than the first game, the sequel expands vastly on all the techniques employed in the original. Graphics have been digitised from original matte paintings, whilst William Shatner has provided some bits of dialogue for use as samples throughout the game. As before, the game is episodic in format with numerous puzzles presented as different locations for away teams to explore. No release date is confirmed yet, although a pre-Christmas date is expected.

The final new release is the biggest surprise. Titled **STARFLEET ACADEMY**, this flash-looking game should be one of the most impressive Star Trek games ever. Set as a sequence of lessons at the academy, the game is basically a 3-VGA flight sim offering numerous 3D missions. Decisions of captain calibre need to be made if you're to graduate. No screen shots have been released as yet, but we should see the game in the first quarter of 1994.

Star Trek: 25th Anniversary, Star Trek 2: Judgement Rites, Star Trek: Starfleet Academy - Interplay



NEWS

B-Wing -
US Gold/LucasArts

Psychosis is currently waiting in the wings with a number of rather nifty-looking products, all of which should be out in time for the Christmas period. The first is the game with the highest profile of the bunch - **MICROCOSM**. Those of you who don't know about this CD specific product either haven't been paying attention or have been living on another planet. Created using fully-rendered images on a Silicon Graphics workstation, the game looks absolutely stunning and manages to portray its subject matter exceptionally well. What's it about? Imagine Asimov's Fantastic Voyage brought bang up to date and mixed with a shoot'em-up...There you have it. Watch for a review next issue.

The second title is one that has been knocking around on the Amiga for some considerable time, **HIRED GUNS**. Using first-person perspective graphics in four different windows on screen at once, this looks absolutely superb. A must for all Captive and Space Hulk fans.

Finally, we have Psychosis' first foray into the point and click adventure genre, in the shape of **INNOCENT**. Your character has been framed for crimes which he hasn't committed and your job

is to prove his innocence without being caught by the authorities. Set in a beautiful futuristic scenario, this should be yet another British product which proves LucasArts are the only guys capable of knocking out a decent adventure.

To say that Storm's forthcoming **LAWNMOWER MAN** game looks impressive would be somewhat of an understatement. Using pre-rendered VGA graphics, it would be safe to say that it's one of the most impressive-

Lawnmower Man - Storm



looking games to appear...since the last one. Can all these visuals be coupled with a decent game though? We haven't seen much of the product yet, but we do know that it will incorporate a number of different playing styles including puzzles, platform sections and 3D flying bits. Watch for this CD-only product in December.

What a month for Star Wars stuff! No sooner have we learned that Rebel Assault is just around the corner, we also receive our first screen shots of the second X-Wing missions disk, **B-WING**. Featuring a brand-new fighter craft (the B-Wing funnily enough), this disk offers a whole new tour of duty with new cut-scenes as well as some cameo appearances from both Luke and Princess Leia. Can the PC Player office possibly bear the possibility of two Star Wars games in the office at the same time?

Watch for B-Wing appearing through the shops in November from US Gold, priced at £19.99.

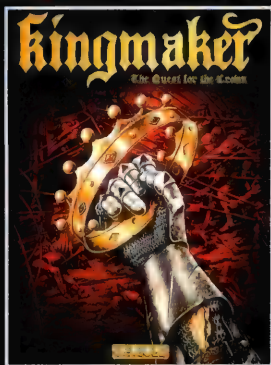
What do the games Silent Service II, Red Baron, Railroad Tycoon and The Perfect General all have in common? They're all a part of Ubisoft's **LORDS OF POWER** collection which should be in the shops as you read this. Priced at £39.99, it looks like a really good deal for any of you who are after these ageing megalomaniac games.

Mindscape is preparing to release **DRACULA UNLEASHED** this December - a CD-only FMV adventure very much in the vein of the recent Sherlock Holmes adventures. Using some of Bram Stoker's original characters, the game takes a slightly different perspective on the story. At present the game is going through some thorough game testing, but we should be able to take a look at it next month. The quality of the FMV we've seen so far is superb.

Dracula Unleashed -
MindscapeMicrocosm -
Psychosis

PLAGUES bloody ANARCHY at EXECUTION

THE MOST ENJOYABLE STRATEGY GAME YOU WILL EVER PLAY



When chaos rules, a King *is* the making. The War of the Roses is ripping the land apart as you do battle for the ultimate prize. In time, one man will emerge as King of all England...

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Kingmaker. Battle for glory and seize your prize.



Screen shots are only intended to be illustrative of the gameplay and not the screen graphics which may vary considerably between different formats in quality and appearance and are subject to the computer's specifications.

Available On: PC & Compatibles, Atari ST and Amiga.

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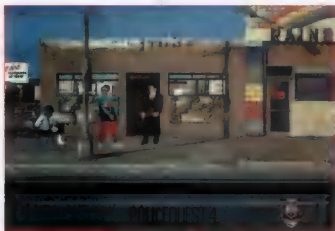


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(Right and bottom right) *Aces of the Deep*,
(Centre) *Quest for Glory* - Sierra/Dynamix



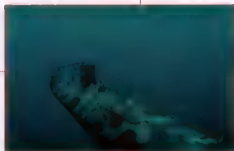
(Right and above)
Police Quest 4 -
Sierra/Dynamix



It looks as though we can expect to see a whole bunch of new titles and 'next in the series...' games coming from the Sierra and Dynamix camp at the end of the year.

First up is the new **POLICE QUEST** game - same format and graphics as before, but this time all of the graphics throughout the adventure are digitised. A wide variety of 'live talent' was used for the game, much of it coming from Sierra's own offices in the States. Watch out for the topless dancer in the seedy bar...hmm, could a BBFC rating be waiting in the wings, perhaps?

Next is the new *Quest for Glory* game, **SHADOW OF DARKNESS**. The new tale expands on previous adventures while dwelling on a much more horrific story-line. There seems to be a rich variety of characters (mad



doctors, cackling witches, old crones and a large number of bats) and the game employs what Sierra is peddling as "the greatest adventure combat system ever". We shall see...

On the Dynamix label, games with the prefix "*Aces of...*" seem to be exceptionally popular. With the forthcoming **ACES OVER EUROPE** (which we will be reviewing in issue two) set to impress fans of WWII combat, the next in the series is actually a Silent Service-style submarine strategy game - **ACES OF THE DEEP**. This employs a similar graphics system (shaded polygons playing a major role) to the successful Dynamix flight sims, but in a sub combat scenario. Definitely worth checking out.

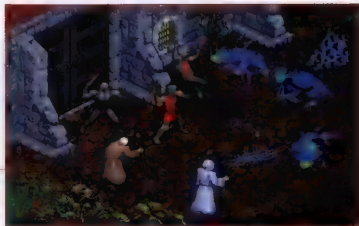
Set for release in early 1994 is one of the most graphically impressive games Sierra has ever unleashed. Currently in the very early stages of development, **OUTPOST** is a Utopia/Civilisation-style game set in space. Probes are sent out to discover

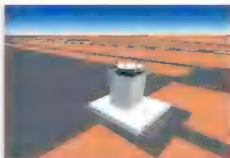
planets, and then you must colonise and sustain your new home while ensuring the population remains both happy and productive. Using some exquisite SVGA graphics, Outpost looks set to create new standards for this style of game.

It's nearly ready. The next generation of the Ultima game engine is complete and the latest instalment in the series is due for release in January. Can **ULTIMA VIII** top the quality of the last few games?

Surprisingly the game is actually smaller than previous titles but this time there has been a dramatic change in the graphics engine. Have a quick look at the screen shots and I'm sure you'll agree that the new system looks bloody good. The viewpoint has switched from a top-down affair to a newfangled skewed perspective screen and the game characters are considerably larger than those found in Ultima VII.

Ultima VIII:
Pagan -
EA/Origin





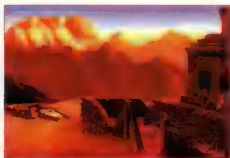
Gulf Scenario Disk - Digital Integration

This latest game is the first of a final trilogy which will see the end of the Ultima series of RPGs. Watch for a massive preview soon.

Although US Gold normally snaps up the Sir-Tech titles, there is no confirmed UK release date for **JAGGED ALLIANCE** - a tactical strategy game which has been in development for a very long time. The game puts the player in command of eight mercenaries who must defend an island from hostile attack. Apparently there are more than 50 different locations in the game and from the screen shots that have been knocking around for the past couple of months, it looks like it could be quite a small little game. More news next month.

The Sim series expands still further with these new multi-media enhancements to the original games. **SIMCITY ENHANCED** provides all of the gameplay options offered by the original, but now FMV sections are fed to the player as news reports on disasters and events worthy of note. In all there are 30 minutes of digitised footage used in the new product and from what we've seen so far it looks extremely impressive.

SIMANTHRA ENHANCED provides some slightly different new features, including fully rendered SVGA ants accompanied by digital sound. To add a little spice to the proceedings, you're also guided on your path to colony domination by comedy monologues provided by



SimAnthra, the ant Queen. Sounds super!

Both products should hit the shops in late November.

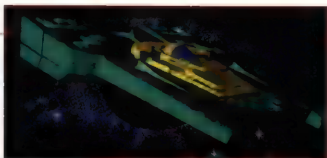
It's been on the way for a while, but we should be seeing the first of the **TORNADO SUPPLEMENT DISKS** hitting the shops at some point in November. Designed to be an accurate representation of the Gulf conflict, the game puts the Tornado into the situation where it first proved to be a formidable force.

You can have a go at pretty much everything you saw the RAF chaps actually doing during the conflict, including dropping bombs down peoples' drainpipes and busting runways up into little pieces with runway fragmentation bombettes.

As 'correct' as possible, the scenario covers a vast area and includes many new ground-based objects to destroy. If you're a real Tornado-head, this is an absolutely essential purchase.

Electronic Arts' distribution of Three Sixty products continues this year as two new products emerge in the pre-Christmas period. **V FOR VICTORY IV** should be out as you read this (see our review on page 60), while the next new title is likely to be **HARPOON II** followed closely by **VICTORY AT SEA**.

This vastly improved version of the Harpoon game incorporates an impressive AI design which simulates



Inca II - Coktel Vision

'fuzzy logic' to provide more realistic decision making. Could this be the first computer strategy game to come close to emulating a truly worthy opponent?

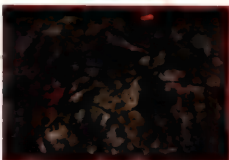
On the other hand, **Victory at Sea** promises an enormous amount of detail with virtually the entire Pacific theatre simulated. The enormous environment is accompanied with a revolutionary play-database known as Gamebook. This unique system incorporates strategic, technical and historical analysis of all gameplay so that the computer can adjust strategies dynamically.

Watch for reviews of both products in the next couple of issues of *PC Player*. All being well, we'll also be able to bring you an in-depth feature about the chaps at Three Sixty in next issue.

Coktel Vision's Inca may have had its faults, but there can be no denying that it was a brave stab at trying something new in terms of presentation. **INCA II** looks even more ground-breaking than its predecessor, and it has the added advantage this time round of seeming much more playable. The 3D combat sections are far more user-friendly (you can actually get to grips with shooting things down now), and the adventure sections are much less linear in nature.

The game should be ready for review by next issue. In the meantime we've got a couple of demo CDs which we'll give away to whoever writes in first with the name of the golden ship in Inca.

(Left) SimCity Enhanced CD-ROM, (Right) SimAnt Enhanced CD-ROM - Interplay





Lilit Divil —
Gremlin Graphics

Gremlin's **LILIT DIVIL** has been in development for years, but now it finally looks as though the horned demon will be raising hell within the next few months. Lilit Divil stars Mutt, a cartoon devil with a bad attitude and breath to match. Mutt's not having a good day. First his apartment went up in smoke, now he's drawn the short-straw and has to go fetch and a pizza. Why not just phone Pizza Hut? Anyway, the nearest fast food joint is miles away and Mutt must journey from hell and back before the pepperoni goes cold.

Lilit Divil is an arcade adventure sprinkled with traps, obstacles and puzzles. Mutt starts his journey outside Hell, a long way from the cheesy pizza parlour the 20-inch supreme topped with chilli, onions, spicy beef and curry sauce. Before Mutt is a labyrinth of tunnels, plagued by man-traps which bite his legs, spikes and moody convicts that punch him through the cell bars!

Most of Mutt's time is spent exploring the dungeon network, looking for ways past the puzzle rooms which appear occasionally. Lilit Divil is first spooked by a gigantic spider which tangles Mutt up in a sticky web. Don't bother trying to rip out of the cocoon, nip down to the local store and buy some bug repellent. Return to the arachnid's lair and squirt the spray in the she-beast's face! Although Mutt lives in Hell things often get too hot for him to handle. Leaping across the muddy swamp is easy until Mutt is

burned by the fire thrower at the end of the room. Douse his fiery breath by scooping up the mud in a bucket and throwing the goo at the hot-head.

These rooms are typical of the puzzles in Lilit Divil — humorous yet tricky. Graphically it's excellent, but that is hardly surprising considering Mutt was painstakingly animated by cartoonists who previously worked on the gorgeous Don Bluth cartoons.

Gremlin is due to release Lilit Divil in November, with a price tag around £39.99.

Just as we were going to press we learned some rather juicy details about Sierra's forthcoming **GABRIEL KNIGHT** adventure (previewed on page 100). Apparently voices for the game have been recorded by Michael Dorn (Lt Wolf from Star Trek: Next Gen), Mark Hamill (anyone who doesn't know who he is should be strung up and shot) and Tim Curry. Sounds like the game could be quite an impressive multi-media package.

It seems like the big software houses are all trying to tell us something. Just about every other new game we take a look at seems to have a scenario along the lines of "all the giant corporations are the ones that are really in control".

Guess what? **SUBWAR 2050** is another game where the pre-release blurb talks of overthrown governments and big, world-controlling firms. Apparently the scenario in this game is that everyone is engaged in exploiting the vast mineral deposits beneath the sea, and as a result a whole new technology has evolved. Corporations now fight with hi-tech subs as each tries to protect its own patch.

As far as we can see, Subwar looks like a very impressive underwater combat sim and the graphics are really quite super. All the views and options you'd expect from a game like F-15 III are present, but with all the action

taking place deep beneath the waves. We're assured that the project has been close to completion for some time, so we should see a finished copy within the month.

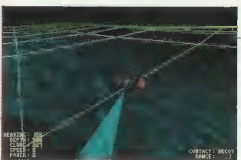
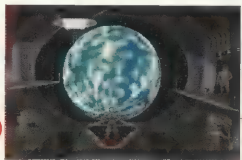
STARLORD on the other hand has been much publicised over the last few months, but as we go to press we've just discovered that it's been delayed until mid-November. As you're probably aware, the game has been developed by Mike Singleton (Doomdark's Revenge, Lords of Midnight, Dark Sceptre) and is a clever blend of Elite-style 3D space combat coupled with a fairly meaty intergalactic strategy game covering 100 different star systems. Fight your way through a galactic dynasty to eventually control as much of the universe as possible. Definitely a game for trainee megalomaniacs.

A real quickie this one...Rumours are knocking around that 1994 will see the next generation **FALCON** sim hitting the market. Spectrum Holobyte is keeping pretty quiet about things, but the likelihood of it being an SVGA product is extremely high. More news soon.

Mike Singleton hits the news yet again as the third instalment of the ancient but classic **LODS OF MIDNIGHT** series is announced by Domark. Incorporating state-of-the-art fractal generated landscapes, scaling graphics and a whole load of characters, the game looks set to impress the pants off anyone who remembers the old Specie version. Watch for a preview soon.

Talk about flogging an old horse! SSI has recently announced that it is to release the fourth **EYE OF THE BEHOLDER** game next year. Not many details are known as yet, apart from the fact that it's likely to only have one player-controlled character as opposed to a whole party.

Subwar 2050, Starlord —
Microprose





PAGE 16

SUPER TEST

AS PC COMBAT SIMULATIONS BECOME MORE AND MORE

COMPLEX, WHICH TITLES WILL STAND THE TEST OF TIME? ARE THE LATEST SIMS

THEY'VE

WITH THEIR GOURAUD SHADING AND BIT-MAPPED POLYGONS REALLY THE

THEY'VE

BEST? WE TEST THE 10 MOST POPULAR SIMULATIONS IN AN

AND

ATTEMPT TO ESTABLISH WHICH PRODUCTS ARE

THEY'VE

REALLY WORTH THE MONEY.

combat SIMULATORS

FEAT
URE

IT seems these days that we get a new state-of-the-art fighter combat simulation popping up almost every month. With so many products available, how are you supposed to know which games are really worth your time and, more importantly, your money? What's to say that one product is better than another?

Since Digital Integration released Tornado onto an unsuspecting public a couple of months ago, the quest for better and more technologically advanced simulations has hotted up to such an extent that a sim which is considered state of the art today could well be out of fashion in a short space of time. The only way to actually see what is worth spending your cash on is to look at straight comparisons, and draw conclusions from them.

Our Super Test has been designed to evaluate the products which you can go out and buy today. Visit your local software shop and these 10 (all very different) jet combat simulators will be the most prominent and widely available products. Several have been around for a year or more, but are the latest products really superior? Many of the latest games may require high-spec machines and enormous amounts of memory – but is this all really justified?

We have broken the test down into separate categories which each cover the more important aspects of a simulation. With the help of our consultant, ex-RAF pilot Mark Hanna, we've endeavoured to establish which simulation is best suited to your needs and have graded them accordingly.

Are the good-looking games with all that fancy gouraud shading really the most realistic? Are some of the products just too complex for their own good? Read on...



We just can't stop salivating over Falcon 3.0! Check out the evening sunset falling on the pilot's arm inside the cockpit!



Although ground detail is a little on the thin side, F-15 Strike Eagle III does have its moments. Here for example is a 'too-close-for-comfort' shot of a towering monument deep in the heart of Baghdad.

STRIKE COMMANDER

PRODUCT

Strike Commander

SOFTWARE HOUSE

Electronic Arts

SYSTEM REQUIREMENTS

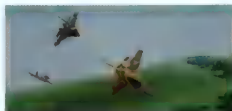
486 (33+ Mhz), 4MB RAM

PC PLAYER RECOMMENDS

486 (56+ Mhz), If you're get one!

Strike Commander is one of the most processor-heavy games of its type. While the graphics are fast and detailed and the texture mapping is incredible (although it does distort when close up), Strike Commander isn't perfect. Fighter controls appear sluggish and restrictive in places and the simplified cockpit display results in a rather cramped HUD. This lack of space results in a feeling of claustrophobia.

Actual combat can be very confusing for novices and dogfighting is difficult when the enemy is this hard to find! The manual offers plenty of rudimentary dogfighting advice and this may help the more bewildered pilot to come to terms with Strike Commander's idiosyncrasies.

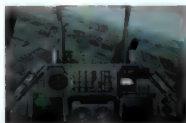


On a fast PC with a decent soundboard, the game runs at a fair whack and remains impressive, although lower-spec machines are a different matter. Having said that, even on a 486 DX the game became slow and jerky over detailed cities. Sometimes the action came to a halt while the game accessed the hard drive!

With a decent flight model and superb presentation, Strike Commander is one of those titles that nearly was, but never quite made it.



There is no end of detail crammed into Strike Commander, and this screen shot demonstrates just a small amount of it. Cities, deserts and even castles are all portrayed in glorious bit-mapped Technicolor, leaving nothing to the imagination. The only down point is that if you've got anything less than a very high-spec 486, it'll look as though you're wading through sticky syrup!



I feel that the HUD is a little too cramped to present the amount of information it does comfortably. Everything seems to have been crammed into the cockpit interior as an afterthought.

DETAIL

ATAC	★★★★
AV8B HARRIER ASSAULT	★★★★
CHUCK YEAGER'S AIR COMBAT	★★★★
F-117A	★★★★
F-15 STRIKE EAGLE III	★★★★
FALCON 3.0	★★★★
HARRIER JUMP JET	★★★★
JETFIIGHTER II	★★★★
STRIKE COMMANDER	★★★★★
TORNADO	★★★★

The first thing that grabs your attention after you've loaded the latest sim is the way that it looks. Out of the games that we have tested, the two ends of the spectrum could be taken as Chuck Yeager's Air Combat, with its sparsely detailed landscapes and relatively simple polygons, and Strike Commander which, let's face it, looks not unlike a commercial simulator, ie pretty bloody impressive.

What are we left with are games that

approach the problem of graphic detail in different ways. Falcon 3.0 uses simple polygon models, but in such a way as to render all the aircraft and ground installations high enough in detail so that when you are in a dogfight with a MiG-29, you can actually tell that it's a MiG-29.

AV8B is another that follows the 'simple is best' rule. By concentrating on the flight model and making the graphics more functional than aesthetically pleasing, the simulation is speeded up.

As well as the simple polygon models, Tornado uses something a little more advanced for its graphical displays. The Tornado is primarily a ground-attack aircraft, and the graphics need to reflect the sensation of speed at altitudes as low as 100ft. The program does use polygons, but they tend to be more complicated, and are used to portray such things as power stations and small towns with remarkable clarity.

Like in Chuck Yeager's ground detail in J2F has been cut down in increases the frame rate. There are bombing missions in undertake, and so you'd think that it would make sense to incorporate a little more detail than there is

FEATURE

F-15 STRIKE EAGLE III

PRODUCT

F-15 Strike Eagle III

SOFTWARE HOUSE

Microprose

SYSTEM REQUIREMENTS

386 (33+ Mhz), 2MB RAM with EMS

PC PLAYER RECOMMENDS

386 (33+ Mhz) and above

Cold War paranoia aside, Microprose's F-15 Strike Eagle III improves tremendously over its rather rapid earlier effort, F-15 II. Detail, depth and realism have all been included this time, which is sweet relief to simulation fanatics!

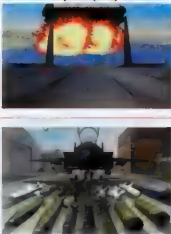
The hefty manual is informative and entertaining but can initially be put to one side and the Quick Start option chosen. As you would expect, this is a simplified version of the flight model with all settings set to standard rather than the more realistic authentic setting. This allows the player to adjust difficulty settings very gradually

The cockpit display in F-15 Strike Eagle III is clear and easy to follow, but this does result in a lack of authenticity. Even the Tactical Early Warning System (TEWS), shown bottom-right, uses simplified icons for easy target identification



The attention to detail is an important factor in Tornado. After all, you wouldn't be able to get a real feeling of speed without having fairly involved ground structures whizzing by

Arguably the most impressive view in F-15 III is from the Weapons System Officer's seat at the back. After bombing a large enemy port, I switch views to check weapon effectiveness. Looks like they were pretty effective!



by switching certain flight features from standard to authentic as they progress. F-15 is pretty easy to get into (relatively speaking!) if you keep the gameplay simple.

Three combat theatres are available at the outset, one of them an authentic replica of Operation Desert Storm and two other fictional scenarios over Korea and Panama. Campaign-wise, F-15 contains plenty of depth and variety, but doesn't seem to get them together perfectly - as a pilot I never felt part of the overall war, confined to my own two-seater and my own piece of airspace.



HARRIER JUMP JET

PRODUCT

Harrier Jump Jet

SOFTWARE HOUSE

Microprose

SYSTEM REQUIREMENTS

286 (16+ Mhz), 1Mb RAM

PC PLAYER RECOMMENDS

386 (33+ Mhz) and above

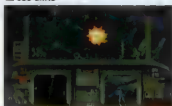
Microprose's Harrier Jump Jet is another game that relies too much on graphical presentation, forsaking gameplay as a result.

While the flight model is pretty sound, the campaigns lack the depth of Domark's AV8B, making this a much less satisfying product. All three of the available combat theatres (Falklands, Hong Kong and Scandinavia) are similar in both terrain (bar the ground colouring) and scenario. Almost every aspect of the simulation can be toggled to suit your requirements - the usual Training Mode selector allows a steady understanding of the Harrier controls, and difficulty can be gradually increased by raising the artificial intelligence of the enemy. Grasping the hovering capabilities of the Harrier may take some getting used to, but take the time to learn the procedure, after all, landing after a successful run is a priority.

If you prefer your flight simulations to remain relatively simple, then Harrier Jump Jet could be just what you are looking for.



SAM sites are never easy to spot at the best of times, but locating them at night is more difficult - use the HUD night-vision goggles to spot these hard to see units



➤ JF2 and Chuck Yeager's can be lumped together because their style of graphics are very similar. Both use sparse ground detail and simple aircraft models, with the emphasis placed on producing something that moves relatively speedily.

The Microprose offerings (not counting Falcon 3.0) utilise some of the newer techniques to make you believe that you're actually flying a military jet. Harrier makes use of the 'much-understood' about-but-never-quite-understood' gouraud shading technique to produce some incredible hill and valley scenes.

F-15 III also uses a slightly different graphics system, this time to produce something that makes the sky look as though it actually belongs up there and not down on a graphic artist's Kozala pad! ATAC is worth a mention because it portrays everything in a very blocky style that gives no feeling of actually 'being there', as does F-117A, but to a lesser extent. Last but not least is Strike Commander. Everything that can be

done with a PC has been achieved, with full use of gouraud on the terrain and complex bit-mapped polygons portraying the aircraft and ground installations.

MISSIONS

ATAC ★★★★★
AV8B HARRIER ASSAULT ★★★★★
CHUCK YEAGER'S AIR COMBAT ★★★★★
F-117A ★★★★★
F-15 STRIKE EAGLE III ★★★★★
FALCON 3.0 ★★★★★
HARRIER JUMP JET ★★★★★
JETFIGHTER II ★★★★★
STRIKE COMMANDER ★★★★★
TORNADO ★★★★★

"Missions maketh the sim," so a wise man once said (probably), and with Tornado the choice is literally limitless. After flying through all the simulator missions, there are then the training missions to undertake should you choose, followed by single combat

missions over three different landscapes. As if all this wasn't enough, there is then the option of overseeing a whole war campaign, with you controlling targets, combat sorties and the amount of planes in each mission!

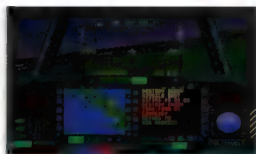
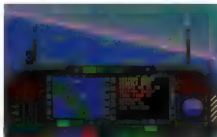
As far as scope for missions is concerned, Tornado stands head and shoulders above anything else currently on the market. In fact, the only other sim to offer a full campaign mission



The most striking part of Tornado is the incredible mission planning software. With this, it's possible to plan a complete attack sortie for up to six planes. It's very easy to use, and is easily the best system ever to appear in a flight sim

FEAT
URE

F-117A



Low flying at 500ft over some night-lit enemy installations. In training mode, night and day can be toggled by pressing Alt/N - this should help with becoming accustomed to the night-sight targeting system

PRODUCT

F-117A

SOFTWARE HOUSE

Microprose

SYSTEM REQUIREMENTS

286 (16+ Mhz), 540K RAM

PC PLAYER RECOMMENDS

386 (33+ Mhz) and above

F-117A is woefully outdated when compared to simulations such as Falcon 3.0 and Tornado. The concept is pretty good - you fly a classified stealth fighter into enemy territory, then deny all involvement and avoid embarrassing political stand-offs. Unfortunately the flight model isn't quite as daring as the missions imply. The graphics are very basic and include sparse ground detail, and the cockpit display appears simplified for the sake of the inexperienced game player.

While the game does offer the choice of 10 different combat



theatres, the missions are hardly the epitome of depth. One must bear in mind that by the nature of the craft you're flying, the missions provided are isolated sorties (rather than larger, involved operations), so don't expect an in-depth campaign planner bolted onto the package.

Included within the game is an option to fly two different versions of the F-117A: a Microprose flight model - simplified for training missions, and a Lockheed version - a supposedly authentic flight model based on the US standard issue F-117A.

planner is AV8B, but it falls sadly short because of the awful user-interface that goes with it. Falcon contains a fair amount of missions, but doesn't allow you to take control of a campaign, and the Microprose offerings (Harrier, F-117A, F-15 III and ATAC) only allow you to partake in limited scenarios in various hot spots around the world. Even Strike Commander won't hold your attention for that long once you've discovered the limited range of missions.

In fact, when it comes to how long you're going to be playing the game, missions are only part of the deal. The other factor is how good the game is. Chuck Yeager's may not be the most authentic flight sim around, but it is very enjoyable to just climb into the plane (in a manner of speaking) and engage in some good, home-cooked dogfighting action against some WWII adversaries. With something like ATAC, or even Tornado, that just isn't possible and so the missions variable only applies if

everything else in the sim is cooking on gas, which just happens to be the case with Tornado.

PRESENTATION

ATAC ★★
AV8B HARRIER ASSAULT ★★
CHUCK YEAGER'S AIR COMBAT ★★
F-117A ★★
F-15 STRIKE EAGLE III ★★
FALCON 3.0 ★★
HARRIER JUMP JET ★★
JETFIGHTER II ★★
STRIKE COMMANDER ★★
TORNADO ★★

Flying high in the presentation stakes is EA's Strike Commander - the two and a half years of intensive development have definitely paid off for Chris Roberts and his programming team. Strike Commander's incredible visuals (witness the revolutionary joystick pan technique) and painstaking attention to

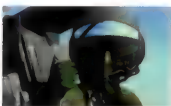
ATAC

it is the year 2003 and the illegal drugs industry has developed into an unstoppable network of violence and greed. The United Nations, realising the scale of the threat, has developed a special team of elite pilots with which to destroy the might of the drug barons.

As the commander of this covert force you must build up an intelligence network, study reconnaissance reports, then send flights to strike over drug factories, plantations and road shipments. With eight pilots, eight F-22s and eight Apache Gunships located in a secret airbase in Colombia, you must conduct day-to-day missions to stamp out the drugs menace.

The entire operation is in your hands, whether it be taking command of every available resource or simply sticking to a cockpit seat. Flying an F-22 is straightforward enough, but the Apache Gunships are a different matter - as the saying goes: practice makes perfect!

The anti-drug campaign featured in ATAC has a tremendous amount of scope, with plenty to tathom before you should even contemplate taking control of the entire campaign.



PRODUCT

ATAC

SOFTWARE HOUSE

Microprose

SYSTEM REQUIREMENTS

286 (16+ Mhz), 540K RAM

PC PLAYER RECOMMENDS

386 (33+ Mhz) and above

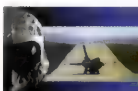


Wingman Division has started his ground attack, the rest of my team still have time before engagement. Keep checking local enemy activity for signs of counter-attack

graphical detail combine to form a force to be reckoned with. Even the nearest competitor, Harrier Jump Jet, doesn't quite reach the same level of presentation. Harrier does surpass Strike Commander in terms of speed (as mentioned elsewhere), with Strike Commander slowing badly on 386 PCs, but it was never designed for use on these machines in the first place!



The best flight simulations usually have an object viewer bolted onto the front end and Falcon is no exception. Cycle through either the enemy or the allied craft and vehicles



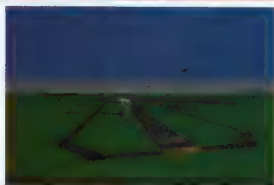
Falcon attempts to include a portion of full-motion video (FMV) in its introduction sequences. Although not of CD-ROM standard, it is nevertheless impressive

FEATURE

CHUCK YEAGER'S AIR COMBAT

TORNADO

It's always said that there ain't no love in the heart of the city. Well, pretty soon there isn't going to be a city because I feel an unexpected bombing run coming on. Say hello to Mr Radar-Bomb and his close personal friend Mr Strafing-Cannon!



PRODUCT

Tornado

SOFTWARE HOUSE

Digital Integration

SYSTEM REQUIREMENTS

386 (16+ Mhz), 1MB RAM, 600K Conventional Memory

PC PLAYER RECOMMENDS

386 (32+ Mhz), 1MB RAM, 600K Conventional Memory

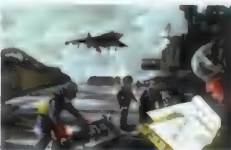
After wading through the impressively heavy (but enjoyable) manual, you'll realise that Tornado is definitely a simulation, and not a game. Apart from having everything found in a real Tornado, it also features possibly the most advanced and powerful mission planning software found in any sim. In fact, the RAF has produced something similar with a view to using it in real combat situations.

Apart from the planner, there is an unprecedented amount of realism in the flight model.

Everything that a real Tornado could do is accurately portrayed in the simulation, including an out of control spin, something that no other flight sim offers you the opportunity to do. Coupled with the incredible terrain-following auto pilot, that allows you to fly at 200ft as fast as you want.

Tornado is putting players into an environment that would otherwise require a few hundred hours flying time and a green flight suit.

Microsoft's Harrier Jump Jet does display the most impressive cut screen intros. Drawn and digitised illustrations add an extra dimension of class to the product



There are some great outside views in here had in CV and, because the ground detail has been cut down to concentrate more on the planes, it all moves very smoothly, even on something as lowly as a 286

PRODUCT
Chuck Yeager's Air Combat

SOFTWARE HOUSE
Electronic Arts

SYSTEM REQUIREMENTS
286 (12+ Mhz), 640K RAM

PC PLAYER RECOMMENDS
286 (12+ Mhz), 640K RAM



The selection screen at the start of the game should give you some idea of how the game is going to stand up against some of the more recent sims, with very few options and only a limited amount of pre-programmed missions for you to fly



Launched a few years ago, Air Combat is still a very good flight game. Concentrating solely on the various aspects of dogfighting, it includes none of the more complicated scenarios that some of the more recent sims contain, such as bombing missions or reconnaissance sorties.

One of the most impressive features of the game is the ability to fight in any one of six planes – ranging from WWII P-51s to F-4 Phantom jets from the Vietnam era – against a plethora of combat aircraft from different periods. Imagine flying an F-4, complete with Sidewinders and cannons, against a B-17 bomber from the Second World War! Apart from this, there is also a large number of pre-installed missions that are accurately culled from real life combat events, including a fair few that Mr Yeager himself has flown on.

Graphically, the game is a mixture of polygons and bit-mapped images and moves very smoothly. As a flight and combat sim it is left behind the more recent ones, such as Tornado and Falcon 3.0, but as a dogfighting game it is still a very worthwhile addition to the genre.



➤ Falcon 3.0 avoids the lower presentation bracket by being so bloody smart in terms of depth. All of the external views feel functional, especially the superbly executed padlock view, while the fighter never appears to be too cluttered.

Chuck Yeager's Air Combat, Jetfighter II and F-117A are a different matter. All lack finesse, with Jetfighter II being the worst of the bunch in our opinion. Chuck Yeager's lacks detail, but it is bold and bright and doesn't have the pretensions of other, lesser simulations. Look at Jetfighter II and Chuck Yeager's in terms of overall presentation, and both come off pretty badly. Then compare both of these programs to Strike Commander and they come nowhere near it.

F-117A comes off far worse than F-15 Strike Eagle II. The F-117A intro is poor, not forgetting the phenomenally oversimplified cockpit representation, whereas F-15 II looks fine in the air but still sports a dodgy intro sequence.

This shot from Strike Commander is another example of stunning attention paid to detail. It is the way things are going (and I'm sure that it is), then apart from the games getting better, we're all going to have to break into the large whisky jar and get new PCs!



Tornado and ATAC both look great but lack detail. Tornado doesn't boast any animated or texture-mapped objects, but the presentation is clean and crisp – witness the high-res stills on the set-up screen. The 3D multipurpose cockpit display in ATAC is quite novel but doesn't seem to work as well as a 2D counterpart, and the ground detail is lacking to say the least.

**FEAT
URE**

AV8B HARRIER ASSAULT

JET FIGHTER 2: SPECIAL EDITION

Although not a true combat sim, JF2 is perfect for someone who has not played too many simulations before. It possesses no mission planning software, but the amount of sorties you can fly number over 200, which goes some way to redressing this shortfall. Graphically quite impressive (considering its age), JF2 still manages to get one over its contemporaries with a fairly heavy emphasis being placed on carrier landings. Imagine coming in to land at over 200mph, on something only a little longer than the average village street – tricky at the best of times! It's still worth a look even at this late date, because JF2 manages to encompass all the features of a scaled-down sim with the action of a shoot-'em-up in one package. It should go some way to appeasing the majority.

PRODUCT

Jet Fighter 2: Special Edition

SOFTWARE HOUSE

US Gold

SYSTEM REQUIREMENTS

286 (12+ MHz), 640k RAM/CGA

PC PLAYER RECOMMENDS

386 (33+ MHz), 640k RAM/VGA



This was one of the first flight sims to feature a full-scale war scenario. Of course, this has now been taken to even greater lengths with the release of Tornado, but AV8B also allows you to take command of ground and amphibious troops which takes this sim into the realms of a strategy game.

The game features a complex flight model that takes all the important criteria into account and gives a very good 'feel'. Apart from the model, AV8B also offers some of the smoothest graphics seen in a flight sim, even on a low-spec machine. Part of the reason for this is because the ground detail has been kept to an absolute minimum, with things such as trees and hills resigned to the area of simple polygons as opposed to complex bit-mapped images. Couple this with the battle planning and the feel of the plane, and AV8B proves itself to be a real contender to the Super Test crown.

PRODUCT

AV8B Harrier Assault

SOFTWARE HOUSE

Bombard

SYSTEM REQUIREMENTS

386 (16+ MHz), 2Mb RAM (KMS)

PC PLAYER RECOMMENDS

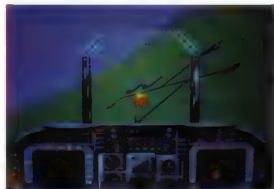
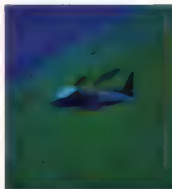
386 (33+ MHz), 2Mb RAM



The smoothness of the graphics displayed in AV8B go a long way to making the game as playable as it is. If it wasn't for the fact that the mission planner is so difficult and unfriendly to use, this would definitely be a winner in the flight sim-combat strategy game stakes



Another area where JF2 shows its simplistic attitude towards things is in the arming of the plane. You don't have the freedom to take on board what you want. Instead, you can configure it with defaults from a setup of air combat, ground attack or a little bit of both.



EASE OF PLAY

ATAC ★★★
AV8B HARRIER ASSAULT ★★★★★
CHUCK YEAGER'S AIR COMBAT ★★★★★
F-117A ★★★
F-15 STRIKE EAGLE III ★★★★★
FALCON 3.0 ★★★★★
HARRIER JUMP JET ★★★★★
JETFLIGHTER II ★★★★★
STRIKE COMMANDER ★★★★★
TORNADO ★★

While a game can be easy to pick up and play, it may take a great deal of time to learn the subtleties of the program and become more competent at the controls. All of the featured simulations have a Quick Start option allowing instant training flights, most of which have individual flight options that can be switched to 'training' or 'authentic' eg landings, crashes and weapon effectiveness. When confidence and understanding of the controls has

been built up, the options can be toggled to authentic one by one.

Chuck Yeager's Air Combat scores highly for ease of play, but this is because it is more of a game than a flight simulation. Unlike Tornado which has a high proportion of keystrokes, Chuck Yeager's allows the player to get into the game with a limited amount of fuss – take-offs and landings are simplified and air combat is relatively easy.

Of the Microprose products featured, F-15 Strike Eagle III feels easiest to play. The hovering controls in Harrier Jump Jet take some grasping, although once the player is familiar with the keystrokes the Harrier can then be flown with a degree of confidence, and landing should become second nature. F-117A, if flying the Microprose flight model, is easy enough, but the unconventional graphical approach makes it slightly less intuitive.

Di's Tornado requires a heck of a lot of practice to get into. The depth of

initially all the options will be set to their easiest settings, allowing quicker understanding of the flight model's ins and outs. Almost all the games featured in this Super Test have one such option menu



gameplay requires a complete understanding of the flight model and its controls if you want to get anywhere. Falcon 3.0 and Strike Commander are as complex, but not to such an extent – we found them to be much more playable straight away.

FEATURE

FALCON 3.0

PRODUCT

Falcon 3.0

SOFTWARE HOUSE

Microprose

SYSTEM REQUIREMENTS

286 (16+ Mhz), 1Mb RAM

PC PLAYER RECOMMENDS

386 (33+ Mhz), 2 Mb RAM

Keep an eye on your wingmen because they are there not only to play their own part in the completion of the mission, they also need to follow your orders. If an enemy target appears, tell them to engage or they'll just sit there gawping at it...



Because the ordnance is held inside a bay and not suspended from the wings of the F-117A, the bay doors must be opened before weapons are used. Get used to opening the bay doors whilst approaching a target



> With ATAC the flight models are acceptably playable, but the in-depth and easy to set up mission planner turned the war against drugs into a riveting and enjoyable strategy game! Speaking of mission planners, AV8B's enormous campaign option is a wet dream for avionics strategists, and the flight model is pretty good too. Unfortunately, the user-interface is fiddly and unfriendly – the manual lacks pictorial pointers, leaving the player confused as to the correct procedure.

Jetfighter II fares better in this

Regarded by many as the simulation by which all others shall be judged, Falcon 3.0 is still way ahead of its contemporaries (with certain exceptions) in terms of graphical content and sheer realism. It incorporates what must surely rank as one of the most exceptional flight models in any flight sim. In fact the flight model is actually used as simulator in the USA.

As well as the normal flying sorties against a plethora of

targets, you also get wingmen to command, and a load of tutorial flights that get you up and into the action faster than ever before. The game was the first in a series of sims that were designed with the option of linking up two PCs, so that instead of just flying combat missions against the computer a human element could be brought into the proceedings to liven things up.

Falcon 3.0 is one of only two flight sims (Tornado being the other one) that makes use of a maths co-processor to accurately work out the complex mathematics involved in simulating all the aerodynamic characteristics of a fighter aircraft. That in itself should be enough to convince flight sim nuts that this is one hot cookie!



Presentation-wise, Falcon is superb. From the moody intro scenery to the clarity and detail in the many option screens, all do their job very well



section than in any other. It may have poor graphics, dodgy gameplay and a complete lack of realism, but at least it's easy to play!

REALISM

ATAC	★★
AV8B HARRIER ASSAULT	★★★★
CHUCK YEAGER'S AIR COMBAT	★★
F-117A	★★
F-15 STRIKE EAGLE III	★★★★
FALCON 3.0	★★★★
HARRIER JUMP JET	★★★
JETFIGHTER II	★★★★
STRIKE COMMANDER	★★★★
TORNADO	★★★★

Falcon 3.0 rates as one of the most realistic sims at the moment, making use of things such as multiple radar modes and realistic missile behaviour. Compare the likes of ATAC to Falcon 3.0, and it becomes obvious that ATAC lacks even a basic amount of realism.

Tornado has been designed with the idea of incorporating every major system on the real plane into the simulation, and fares very well against Falcon, unlike F-15III or Harrier, which are more like flying shoot-em-ups, albeit with a fair amount of accurate systems in them.

Flight models are also a concern when evaluating realism, and the Microprose games, as a whole, tend to shy away from creating detailed and accurate models. Chuck Yeager's and JF2 could again be compared to each other because they don't have a vast array of weapons and flight systems to operate, and the models are vastly simplified to ignore things such as weapons weight, fuel weight and every other type of weight you could care to mention!

Strike Commander, after receiving every accolade that you could think of, does not have an overly great deal going for it when it comes to realism. The flight model is simple (although not

The Falcon makes a military pass over the runway before attempting final approach. Check landing gear. Check air speed. Check wind speed. We're ready to land this bird...



FEAT
URE

EXPERT OPINION

HAVING established the two most realistic simulations, we handed over to Mark Hanna for an expert evaluation.

"Falcon 3.0 is a very good game. The plane handles very well, although I am a bit surprised by the blackouts. When I was flying Phantoms, I could quite easily manage to pull 7Gs without a flight suit on and not blackout. In the game, I barely got past 4Gs and things started to look very grim.

I think that the cockpit instrumentation is extremely close to the real thing, even down to the 'worm' on the dogfight HUD – the worm is the squiggly line that shows you where your



shells would hit if you fired them at that precise moment.

The only thing that I would say looks wrong is the radar. As far as I'm aware, F-16s don't have little coloured blocks to represent targets, but this may have been done to make the radar easier to read.

The padlock view I'm very impressed with. People don't realise that the most important view when you're dogfighting is straight up out of the top of the canopy. You're always

Mark also commented on the ACMI (the Air Combat Manoeuvres recorder) that Falcon 3.0 boasts. "This is also very accurate. Although when we were flying ACMIs, we didn't have the luxury of a full colour, view from anywhere recording, but we did have something that VERY closely resembles the ACMI playback. It's very good indeed.

As for Tornado, I've only flown the ADV version, but it responds a hell of a lot better than the one in the game. For starters, the controls are way too

THE MOST IMPORTANT VIEW WHEN YOU'RE DOGFIGHTING IS STRAIGHT UP OUT OF THE TOP OF THE CANOPY

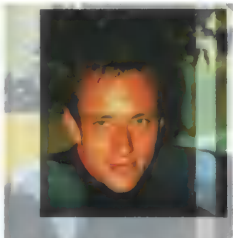
trying to get a lead on the enemy, and the only way you can do that is to keep as wide a field of vision as possible. The padlock view really makes this possible. It's excellent.

One small point I would like to pick up on is the fact that after ejecting in the real plane, the parachute should open above 10,000ft. In the game, it opened much lower than that, sometimes as low as 6,000ft. Very scary!"

sluggish. Even after pulling hard back on the stick, the plane just doesn't seem to want to respond. We used to call them Lead Sleds, but even the real one was more manoeuvrable than this. Another thing that is wrong is the wing configuration limit. I should quite happily be able to fly at 400kts with the wings in mid-sweep, but the game seems to think that this is far too fast and insists on crashing me."

Coupled with the comments from our Super Test expert Mark Hanna, the PC Player team recommends Falcon 3.0 as the most realistic, well-presented and exciting fighter simulation on the market. Tornado runs a close second as one of the top titles, losing points on ease of play because of its complexity, but it's still an incredibly detailed simulation worthy of anyone's time and effort. If you're looking for a strategic sim to add to your aviation prowess, then you could do far worse than Hanna's AVBB or the drug-busting campaign of the Argonaut-developed ATAC.

Flight simulation technology has rocketed skyward over the past two years, and who knows, in another couple of years even Falcon 3.0, Strike Commander and Tornado may be seen as primitive.



Mark Hanna is PC Player's resident expert on modern aerial warfare. With 17 years flying experience, Mark has flown virtually everything from early biplanes in modern jet fighters

to the same extent as Yeager's or JF2) and the systems are really only secondary to getting up there and blowing every living thing out of the sky with missiles and guns. AVBB concentrates on flight model, incorporating something that is up there with Falcon and Tornado, but still manages to keep things fairly straightforward in terms of playability and ease of use.



This is actually a fairly good approximation of an F-4 cockpit. How do I know that? It's because I've sat in the real thing – in fact, I'm probably very nearly a fully qualified combat pilot!

CONCLUSIONS

ATAC	★★
AVBB HARRIER ASSAULT	★★★★
CHUCK YEAGER'S AIR COMBAT	★★★★
F-117A	★★
F-15 STRIKE EAGLE III	★★
FALCON 3.0	★★★★
HARRIER JUMP JET	★★★★
JETFIGHTER II	★★★★
STRIKE COMMANDER	★★★★
TORNADO	★★★★

Every game tested had something going for it, whether it was the depth and quality of mission that ATAC exhibits or the realism the Falcon 3.0.

The lower end of the spectrum was represented by Chuck Yeager's, Jetfighter II and, surprisingly, F-117A. None of these really had the in-depth playability that goes to make up a competent flight sim, with most of the emphasis being placed on ease of use. Added to that, the flight models were

nothing to write home about, being simplistic and relatively inaccurate. If you're looking for simple shoot-em-ups these are the best bets.

In the middle ground ATAC, F-15 III and Harrier Jump Jet all manage to score fairly well. In the case of ATAC, the strategy side of the game managed to pull it out from mediocrity. With simple graphics and an unconvincing flight model, ATAC is not one for the hardened combat pilot. F-15 III and Harrier use new graphics techniques to cover up the fact that they too are rather simplistic.

AVBB, Tornado, Strike Commander and Falcon 3.0 are all top-notch flight sims, offering convincing flight models coupled with missions and depth enough to satisfy everyone. Strike Commander's impressive visuals allow the player to ignore its relatively limited simulation characteristics.

AVBB et al all combine to offer a flight experience for everyone. The combat in these particular aircraft is exciting, tense and, above all, fluid.

**FEAT
URE**

AN UNUSUAL FEATURE FOR

A COMPUTER MAGAZINE?

WE INTRODUCE ONE

OF OUR

CONSULTANT

REVIEWERS...

THE OLD FLYING MACHINE COMPANY

THE Old Flying Machine Company was originally formed in 1981 by ex-Red Arrows leader Ray Hanna with the intention of preserving, restoring and flying some of the finest examples of vintage aircraft in the world.

Concentrating primarily on fighters, the company currently has the largest collection of flying antiques in the world with vehicles ranging from Spitfires, Messerschmitt 109s, a Corsair, an extremely rare WWI SE5 and a P-51 Mustang. Recently it has taken delivery of the world's first privately owned F-4 Phantom. Although unable to fly the aircraft at present (due to numerous problems posed by both the MoD and

the government), OFMC hopes that within 10 to 15 years it will be able to display the vehicle at air shows around the world, as it does with all its other planes.

The Old Flying Machine works on the premise that all of the aircraft earn

"THE OLD FLYING MACHINE COMPANY IS CONSIDERED TO BE ONE OF THE WORLD'S LEADING MOVIE FLYING COMPANIES..."

their keep. Throughout the summer OFMC flies at air shows nearly every week, but when such events aren't running the planes are used for both movie work and as props for fashion shoots.

The Old Flying Machine Company is considered to be one of the world's leading movie flying companies and has provided the props and talent for films including *Memphis Belle*, Steven Spielberg's *Empire of the Sun* and *Air America* as well as television series including *Piece of Cake* and *Hercule Poirot's Casebook*. OFMC is usually brought in at the early stages of production on a movie, and is involved to the extent of creating storyboards and fully choreographing entire combat and flying sequences.

You may even have seen The Old Flying Machine Company's planes used as props in photo shoots for Volkswagen, Classic Car magazine, Barbour, Marie Claire, The Independent and What Car.

PHANTOM FGR2

The majority of numerous air forces around the world, the Phantom is a phenomenally tough aircraft with Mach 2 performance and a stupendous track record. This example, XV474, was flown operationally by Mark Hanna in the Falklands



**FEAT
URE**

**SPITFIRE**

MARK IX
OFMCo's Spitfire has been a part of the company since 1983 and is a completely original example.

Since it was manufactured in 1943 it has never been rebuilt, and it is this which places its value in excess of £1 million.

FILM CREDITS: The Longest Day, The Battle of Britain, A Bridge Too Far, Hope and Glory, Piece of Cake, A Perfect Hero, Hercules Poirot's Casebook



THE
**OLD FLYING
MACHINE
COMPANY IS BASED AT:**
**THE IMPERIAL WAR
MUSEUM
DUXFORD AIRFIELD
CAMBRIDGE
CB2 4QR**

PAGE 25

**MESSERSCHMITT 109J**

The Me109 is one of two currently flying in Europe and was built in Germany in 1943. The Messerschmitt is the most prolifically produced fighter ever (over 33,000 built) and is credited with having the highest number of kills of any type of fighter craft in history.

FILM CREDITS: Star Over Africa, The Battle of Britain, Piece of Cake, Memphis Belle, A Perfect Hero, Showscan

**P-51D
MUSTANG**

The Mustang has been the nucleus of the company since it was bought by Ray Hanna for \$10,000 in the early 1970s. The plane was built to RAF specifications and was the most successful escort fighter of WWII. **FILM CREDITS:** Empire of the Sun, Memphis Belle, Spanish Lottery

17 YEARS OF FLYING EXPERIENCE

Mark was taught to fly in 1978 by his father, Ray, and made his first ever solo flight from a white coral strip in the Philippines. Upon joining the Royal Air Force straight from school, he flew Hunters before eventually moving on to F4 Phantoms. His 11 years in the RAF included a tour in the Falklands. On training missions he flew state-of-the-art aircraft including Tornados, F-16 Fighting Falcons and Harriers. Added to his operational experience, Mark also

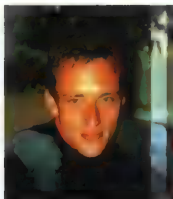
spent a year as an instructor, supervising training with ground-based fighter simulator units.

Now the Managing Director of the Old Flying Machine Company, Mark has flown over 2,000 flying hours in a variety of WWII aircraft. He has been a driving force in the company's movie roles and has been responsible for both the dramatic ground attack in Empire of the Sun and also for leading the Mustang squadron in Memphis Belle.

As PC Player's flight sim consultant we will be calling upon

Mark's experience and talents to assess the realism of all the latest simulators. With his vast experience we can ably complement upon everything from WWI through WWII and on to modern combat aircraft.

This month he has proved invaluable in assisting with our combat simulation 'Supertest' (see page 16). Having actually had experience of a number of the planes simulated, he was able to give us an insight far beyond anything you would normally get from a games review.



**FEAT
URE**



PRODUCT

TFX

SOFTWARE HOUSE

Ocean

PRICE

£29.99

REQUIREMENTS

DOS 5.0, 4MB, 386, VGA, Mouse,
17MB Hard Drive

SUPPORTS

Supports: Joystick, Soundblaster, Adlib,
Roland sound cards

THE NEW
AGE OF
FLIGHT
SIMULATIONS
HAS WELL
AND TRULY
ARRIVED.
COULD TFX
BE THE MOST
EXCITING
COMBAT SIM
YET?

**TACTICAL
FIGHTER
EXPERIMENT**

TFX

**REV
IEW**

DESPITE

the fact that many of today's modern flight simulators concentrate on fictional scenarios set in the near future, it's rare to find something which seems to be an accurate simulation of the future of actual aerial warfare. As the world begins to be gradually unite, it seems inevitable that the United Nations and its forces will become the arbiters of global security. With this new age, contemporary weapons and vehicles will come to the forefront, and it's these which TFX centres its attention on.

TFX (Tactical Fighter Experiment) is a product which has been unleashed amongst much hype and numerous boasts, but can a fictional simulation really deliver both the thrills, spills and technical accuracy provided by Falcon 3.0 or Tornado?

This game is based on three fighter aircraft which are at present at the very leading edge of modern technology. Of the three aircraft simulated, only the F117a Stealth Fighter has seen active service, but all three are considered to be highly classified by US and European governments alike. So how does a development team go about accurately portraying something which has had so very little published about it?

Virtually all simulations are based on current or past aircraft, and the developers are able to research various aspects by consulting works published by the vehicles' manufacturers. TFX's developer, Digital Image Design (DID), was forced to take a completely different route. With the assistance of its aeronautical engineering consultant Roderick Victor Kennedy, the team created mathematical models of the aircraft using the sparse amounts of available data. Wing shape, weight and other characteristics (provided by EFA and F-22 test data which cost the team an absolute fortune) were used to calculate lift, drag and other aerodynamic performance parameters. The results may not be authentic, but are as realistic as possible.



EUROPEAN FIGHTER AIRCRAFT (EFA)

Companies from the UK, Germany and Italy formed Panavia in the 1970s to develop the Tornado. The lack of a dedicated fighter has led to the adaptation of the Tornado into the Air Defence Variant (ADV), however the Panavia partners saw in 1982 that there was still a requirement for a high speed, dogfighting vehicle and thus proposed the Agile Combat Aircraft (ACA), a canard-configured aircraft.

This project was dropped in favour of the European Fighter Aircraft, a vehicle intended to be introduced into active service in the late 1990s. Dubbed the F-16 Plus, the Eurofighter is in the same weight class as the highly successful F-16 Falcon



LOCKHEED F117A STEALTH FIGHTER

Developed by Lockheed and funded by the Defence Advanced Research Project Agency, the Stealth project (code-named Have Blue) was initiated in the early 1970s. The first Have Blue prototype flew in 1978 whilst the second, equipped with RAMs (Radar Absorbent Materials) was tested against captured Soviet weapons in 1978. The first full-scale F117a flew on June 8th 1982.

The F117a was designed to be almost totally invisible to radar, but its unusual shape makes it extremely unstable in the air. To address this problem the vehicle is equipped with the same GEC flight control system (fly-by-wire) as used in the F-16 Falcon



LOCKHEED F-22 SUPERSTAR

In the early 80s the Reagan administration required work to begin on what was called an Advanced Tactical Fighter. The ATF was to be a counter air fighter with supersonic cruise and Short Take-Off Landing (STOL) capability. Originally intended purely for the USAF, in 1986 the US Navy agreed on specifications for a naval ATF as a replacement for the F-14.

The F-22 is the USAF's largest fighter yet, with a 78m2 wing area. All of the vehicle's weapons are carried internally for stealth reasons. Worthy of note in the plane's overall configuration is the fact that there are no vertical surfaces - this is to ensure that the aircraft is as invisible to radar as possible

All the vehicles in TFX are high-performance jets which have had enormous amounts of both time and money invested in them. The EFA and the F-22 are yet to fly in active service and much of the information regarding the F117a Stealth vehicle is classified

THE UNITED NATIONS

With the UN in the news so frequently these days, it's fitting that the organisation's role as world police force be portrayed in a game about aerial

court martial, dismissal and ridicule in the world press.

In terms of play area, TFX is one of the more impressive combat sims to hit the market in recent months. Almost five million square miles of scenery has been carved up between the game's five different scenarios and all of this

THE UN CHARTER:

"TO MAINTAIN INTERNATIONAL PEACE AND SECURITY AND TO THAT END TO TAKE EFFECTIVE COLLECTIVE MEASURES FOR THE PREVENTION AND REMOVAL OF THREATS TO THE PEACE, AND FOR THE SUPPRESSION OF ACTS OF AGGRESSION OR OTHER BREACHES OF THE PEACE, AND TO BRING ABOUT BY PEACEFUL MEANS ADJUSTMENT OR SETTLEMENT OF INTERNATIONAL DISPUTES"

warfare in the near future. This game places the player in the position of a peace envoy in the UN Air Force and poses all of the limitations that a real operative would be placed under.

The force's primary role is to patrol the areas and uphold peace - pilots may not engage the enemy unless fired upon, and then targets are only designated in order to remove a threat to the peace. Failure to comply to these basic rules of engagement results in

land has been accurately reproduced from Ordnance Survey data on the areas. Each scenario is both geographically and topographically correct and all cities, rivers and major landmarks are in their correct positions within the virtual world that has been created. A novel touch is that this model is updated as you continue with the game - whatever you destroy during your tours will remain destroyed until your particular pilot has been killed. ➤

Transition between the different views is far more movie-like than in other games. Views never simply switch from one to another, there is always a zoom effect in or out of the cockpit. Anyone who has played Virtus Racing in the arcades will have an idea of the style of effect



REVIEW

TESTING TIMES IN THE LIBYAN FLASHPOINT

The flashpoint scenarios offer a sort of soap opera campaign mode which is very similar in style to the cut scenes in Strike Commander. In all there are five flashpoint tours, each covering one hot spot.

The Libyan flashpoint places the world on the brink of nuclear war as Ghaddafi refuses to allow UN inspectors to examine an arms depot which is suspected to contain nuclear weapons. Upon arrival in the Mediterranean, the UN fleet is threatened by aerial activity and requires assistance from a local UN EFA patrol...



The EFA is scrambled with a brief to intercept a suspected spy plane heading towards the UN task force fleet. Taking off from a neighbouring base, it should only take a few minutes before interception.



Before encountering the suspected spy plane the EFA is confronted with resistance from Libyan owned F-15 fighters. Once the threat has been established, AWACS gives permission to engage.



Could this really be the spy plane threatening the UN task force? AWACS insists that you engage, but surely a civilian airliner can't be a threat?



It's worth mentioning the enormous variety of weapons available here as well. Although many recent products such as F-15 III and AV8B have included a decent spread of destructive devices, it wasn't until Tornado hit the shops that the more advanced modern equipment was really simulated. Like DI's awesome sim, TFX allows the use of a variety of both interdiction and air-to-air weaponry, much of which wasn't made public before the conflict in the Gulf. Laser-guided GBU's which can be aimed from nearly 200 miles away, CMB 18 runway fragmentation bombs (the flashy ones that have their own little parachutes), Mavericks, AMRAAMs and anti-radiation weapons are all present, along with all the usual stuff you'd expect to find such as sidewinders and the trusty old cannon.

As far as mission areas go, this game is far more original than most. All five of the world trouble spots portrayed are not only of direct concern to the UN, they are also very topical. Firstly we have the obligatory 'Arab General with far more weaponry than he ought to have' scenario (In this case it's Ghaddafi – the naughty boy is stockpiling nuclear weapons in Libya.), then the civil war in Yugoslavia as the UNAF steps in where David Owen has previously failed. Next we have the conflict in Somalia, the problems posed by the all-powerful drug barons in Colombia and finally an original scenario based in the south Atlantic as the world battles for rights to oil found off South Georgia. Each of the scenarios includes objectives which range from basic interception to air superiority, defence suppression and close air-support tasks.

The five groups of missions can be played in up to six different ways, offering many engrossing hours of play. Missions can be played either singly from within the basic simulator, within a 10 part training scheme, as part of a tour of duty which takes you through all of the objectives in each area or even as an arcade game where you are simply flying around trying to shoot things down for points. In this arcade mode the laws of physics are screwed around with somewhat and the game is purely for entertainment. The flight model is reduced to virtually nil and you are provided with an infinite stash of weapons and fuel.

The two most interesting and original options on offer are the UN Command

The views of the missiles can be manipulated as much as the planes. You can switch to a missile camera, pan around the outside of the missile and track it all the way to the target.



Flashpoints are a group of missions described by DID as a form of soap opera, in which you fly your tour of duty with an overall theme. There are a total of five flashpoints on offer, one for each of the hot spots. Each adopts an overall story which your missions will play an

"ALTHOUGH MANY RECENT PRODUCTS SUCH AS F-15 III AND AV8B HAVE INCLUDED A DECENT SPREAD OF DESTRUCTIVE DEVICES, IT WASN'T UNTIL TORNADO HIT THE SHOPS THAT THE MORE ADVANCED MODERN EQUIPMENT WAS REALLY SIMULATED"

system and a tour of duty option referred to as flashpoints. In UN Command a basic mission editor is provided which allows you to choose all of your objectives and any of the game's landscapes. For more details on this, take a look at the Mission Building sequence of shots. It may not be as comprehensive as the incredible system in DI's Tornado, but it provides a way of lengthening the game's appeal.

active part in – if you've played Strike Commander or Wing Commander you'll have a good grasp of the general idea involved.

In the disk version you simply get bits of text with faces mouthing the words to you, however we're assured that in the CD-ROM version (available next month) there will be an awful lot of sampled speech, all lip-synched to the graphics.

**REV
IEW**



The autopilot in TFX is capable of numerous tasks from basic navigation to actually landing the plane back at base



MID-AIR REFUELLING

A new feature which is becoming fairly trendy in modern sims is the implementation of in-air refuelling. The three planes in TFX behave quite differently and you have to employ different methods for each in order to get that damn fuel hose into the right place.



Both the F-22 and the F-117a incorporate a revolutionary fuel probe method. The pilot simply has to fly close enough to the refuelling vehicle for a probe to be lowered and attached to a point midway along the plane's back.



Keeping the EFA in position takes considerable practice, but once the method has been mastered it can be performed quite quickly. Simply fly within range and then alter your heading very gently until contact is made.



TFX is one of the only combat simulators around in which you actually see both the chaff and flares as you launch them. As far as we can remember, only Microprose's original F-19 sim produced a similar effect.

The EFA uses the more traditional method of mid-air refuelling. An interface unit is extended from the side of the fuselage and this must be guided into a tunnel at the end of the fuel pipe.

AS REAL AS IT GETS? THE MOST ADVANCED FLIGHT MODEL EVER?

The game offers a total of four different flight models. Firstly there is the previously mentioned arcade model which basically allows for flight and that's about it. Next we have the simple model which does employ certain rules of physics but is still tremendously forgiving. There's a model that's described as being 'realistic', which matches something along the likes of Falcon or AV8B, and finally the military flight system.

This final model is only really available to 486 users due to it taking all kinds of factors into account as it presents your view of the outside world. Whilst other simulations may pay a passing nod to the effects of the weather, weight distribution and fuel load, the military model in TFX

calculates the performance of the aircraft based on everything from temperature to the location of weapons on the pylons. The calculations required for such a monstrous task seriously eat processor time and if you want to use this fully-

"IF THERE WERE EVER ANY REASON TO JUSTIFY GOING OUT AND BUYING THAT EXTRA 2MB OF MEMORY YOU'VE BEEN PROMISING YOURSELF, THEN THIS IS IT"

fledged flight model you really need a 486 DX33 or preferably higher.

Whilst on the subject of processors, it's worth pointing out at this point that although Ocean and DID claim the game will run on a 386 with 2Mb of memory, but we found that this is not the case. Our test revealed that although even a 386SX 25 managed quite ably with the realistic flight model, if you had anything

less than 4Mb the game was rendered unplayable. Why were such claims made then? DID has employed a clever virtual memory system which decompresses files into a 4Mb area of your hard drive ready for fast access. Unfortunately, the time taken to do this seriously cocks thing up and on occasion we were waiting for up to two to three minutes for something to load!

Having said this though, if there were ever any reason to justify going out and buying that extra 2Mb of memory you've been promising yourself, then this is it. TFX is really quite an incredible game which not only looks absolutely superb, it also has a fluidity never experienced before in a PC combat game.

The 3D graphics engine used to drive this game is really quite astounding ▶

**REV
IEW**



The clouds are far more realistic than those found in most other sims, actually taking on some kind of form. Constructed from numerous shaded circles, the impression of actually flying through the clouds is extremely effective



➤ and it seems to shift enormous amount of detail around the screen at a phenomenal pace. Take the transition between views for example – choose to go to the spotter plane and the view pans out from the cockpit to the rear of the plane so you can pan all around the vehicle. The view will then orientate itself correctly before zooming back into the cockpit. Ever played Virtua Racing in the arcades? The effect is very similar to that.

This fluidity is something which helps create a level of excitement in a flight sim which I've never come across before. Everything seems to have an added degree of realism which helps draw you into the gameplay. Missiles leave a convincing vapour trail, clouds have proper form, countermeasures such as chaff and flare are actually visible, aircraft screech past you with their afterburners fully visible and all objects actually look like they're supposed to. This detail coupled with the phenomenal speed helps to produce a believable feeling of actually being there.

Worthy of particular note with regard to the presentation is the 'virtual cockpit' system which is a further development to the padlock view found in many modern sims. Switch into this mode and the game effectively simulates the pilot's viewpoint. To do this, both the cockpit view and the outside scenery move independently of one another to create the impression that you are actually inside the cockpit rather than sitting with the nose pressed right up against the window.

It's hard to find problems with a product which is so impressive, but there are a few things. The sound...it really is bloody awful in places. The samples of your cannon firing off into the distance or your AWACS buddies feeding you information are great, but the music is dreadful. I'm not that fussed about having a tune humming away in the background as I'm blasting bad guys, but the repetitive drone created by the Soundblaster was really quite

MISSION BUILDING: TARGETS, SATELLITES AND EVEN THE WEATHER

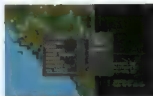
To supplement the tours of duty and the five flashpoint scenarios, TFX also incorporates a mission builder very similar in style to both Falcon and AV8B. You can choose to fight in any of the five available scenarios and specify what will be both your primary and secondary targets.



Using the mission editor is very simple. The game provides you with a check-list which you simply work through, one item at a time



For the selection of individual targets you can zoom in and examine the map in greater detail



There are numerous targets available – inform the flight computer which targets you are aiming for and all the info will then be downloaded to your autopilot



To ensure that you have as much information on the area as possible, you can switch to an overall satellite view



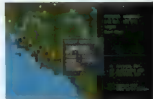
Once you have the required area on screen, you can switch the satellite to 3D mode so that you can view the area as it will look when you attack



You can view every object in the game at this incredible level of detail



Once all selections are made, the mission is created and sent to your flight computer



Choose the weather conditions, the intelligence of the enemy and the abilities of the enemy pilots before scrambling your fighters

horrendous. Things didn't really improve with a better sound card – the crux of the matter is that the music is just plain badly written.

Another minor gripe is the fact that the best method of control appears to be the keyboard. Call me fussy, but I like to be able to throw a plane around the sky using a good old-fashioned joystick, and TFX is just too damn sensitive to allow for reasonable control in this way.

Aside from this I can find no reason not to heartily recommend TFX. It really is a gorgeous game which not only

looks good, but also manages to work on two levels – you can either take it seriously or you can simply treat it as a game. It manages to be just as impressive as Strike Commander whilst still working on comparatively slow machines. Try running Strike on a 386 and then sit it next to TFX on the same spec system and there's no competition. TFX only uses half of the hard drive space as well.

I know I've already practically admitted to wanting to make TFX my girlfriend, but it really must be said that this is well worth investing in. It may not be as fanatically accurate sim like Tornado, but the feeling of actually being a part of the combat is really quite breathtaking. Watching missiles slice through the air a few yards in front of your fighter is very exhilarating.

Although not ready in time to be in our Combat Sim Superfest, I have no doubts that this game would have scored exceptionally high in virtually all of the categories. It has the depth of Tornado with the style and speed of Falcon and the presentation of Strike Commander.

SCORE ★★★★★



Of the three planes used in the game, only the F-22 is designed to be carrier based. As with all other aspects of the sim, the UN fleet is beautifully detailed as it slowly rumbles towards its final destination, and you can look around the carrier as you sit on the launch strip



Designs to TFX is the 'virtual cockpit' mode. Similar to the padlock view in Strike Commander, this option allows you to look all around the cockpit. However, unlike other similar modes in other products, virtual cockpit actually simulates the movement of the pilot's head. Move the aircraft and the cockpit moves independently of the outside view. The result is an effect which realistically gives the impression of being inside the cockpit!



EXPERT OPINION

THIS game strikes me as being pretty impressive.

As far as looks go, the planes actually look like real planes and the graphics overall really are fantastic.

The views, while being nice to look at, do not accomplish very much. The missile view for example, is nothing more than a way for the programmers to show off new graphics techniques. Who really cares about being able to sit on the missile as it moves into the target - you can't do that in a real aircraft, so if anything this detracts from the realism.

As far as the flight model goes, there were a few things which I found a bit disturbing. For example, when you go into a turn the nose tends to drop just a little bit. If you roll on into a turn at about 30 or 40 degrees this really shouldn't happen. Admittedly, when you're in a real aircraft you do instinctively use a bit of back stick, however TFX tends to overdo this a bit.

Another place where I thought that the game slipped up was in its portrayal of wingmen. Quite simply, there aren't any! In reality, there would very rarely be an occasion where a fighter pilot would fly a combat sortie on his own. There would always be at least one other plane flying in formation to watch the lead man's back. Of course, in the stealth bomber the lack of wingmen is correct, but the other two planes would always fly in formations.

There is not a great deal of data floating around at present about any of the planes, but from what I've heard from pilots who have actually flown the EFA simulator, it does perform very well at



Mark Hanna is PC Player's resident flight combat expert. MD of the Old Flying Machine Company (see page 24), he has more than 17 years flying experience on aircraft ranging from Spitfires to Phantoms

high altitudes, and this is portrayed correctly in the game. The cockpits, although designed more from what the programmers think they might look like, also seem to be very good. In new jets, dials and gauges tend to be replaced with digital read-outs and again these have been included in TFX. Of course, no one knows for sure what they actually look like in any of the aircraft because they are all top secret, but it does seem like a fair approximation.

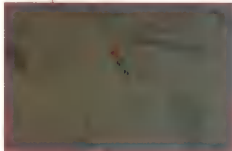
With all the views that the game offers I'd expect to be able to find something where you can look straight out of the top of the canopy - this is very important whilst dogfighting and without this you don't have a lot of freedom. You can adjust the vertical view a little in this game, and you have got that Virtual Cockpit thing - but it's not enough. I would have liked to see a top view incorporated, as this would make dogfighting a lot easier and more realistic.



Part of the thrill in playing TFX comes from the fact that everything in the game is visible. Here we can see a missile tracking in from the distance



Switch to an external view and you'll realise it's too late. What can you do now short of ejecting? An AMRAAM up the tailpipe isn't at all healthy



The game will track the burning husk of your fighter all the way to the ground. Try to eject at about 10,000ft or you don't stand a chance

MARTIN KENWRIGHT TFX PRODUCER, MD OF DID



"We're not trying to create anything that's hyper-realistic, the only thing we're trying to emulate is the most incredible war environment and the most realistic flight model. As far as technical accuracy goes we've not been too fussed - we haven't really bothered about whether or not

you'd burn out a light-bulb if you left it on too long. Flight models are usually produced from textbooks, this has been done from basic physics. We've simulated the planes from their shape in the world - their weight, mass and density. All of our findings came from recently published test results. When you consider that they haven't even built the cockpit for the EFA yet,

we're pleased how much information we've compiled. The game itself was started on a beach in Lanzarote a year and a half ago, whilst the team began work about a year ago with coding taking about six months. The spec surprisingly hardly changed along the way. The model was developed from the engine used in Epic, in fact we can trace the code back to F-22 Retaliator.

The best machine to run TFX on really is a Local Bus system, 66MHz, 486 DX2 and I think that a lot of developers are starting to aim for this sort of level. There's an enormous difference just between the 486 systems that are available these days. We do take the most common format. In this case a 486 DX 33 and then we make allowances for 386 machines."

**REV
REV**

PRIVATEER

OPEN UP AN ENTIRELY DIFFERENT

UNIVERSE WITHIN ORIGIN'S NEW

by

CINEMATIC SPACE EXPLORATION

Paul

ADVENTURE, PRIVATEER.

Malliman

PRIVATEER

the long-awaited third instalment in the Wing Commander series. Although not strictly Wing Commander III, Privateer utilises the same game engine as its predecessors.

In the year 2670 the galaxy is torn apart by interstellar war. The Terran Confederation and the Klorathi Empire are locked in bitter combat. Systems on the fringe of civilisation have turned into lawless, hostile places and survival in these dark reaches of the galaxy is not an easy task – both a cool head and quick reactions are essential if you ever want to see your loved ones again.

Whereas the Wing Commander games approached the Terran/Klorathi war head-on, Privateer acts as a subsidiary program to the previous two

adventures – taking a different course of action which runs simultaneously to the waging battles fought in the Wing Commander scenario.

You are a Privateer, a mercenary looking to better your own position within the sprawling cosmos. From the outset you are allowed to choose your destiny – taking the path of either trader, pirate or mercenary. You have to select missions to suit your status in the space community, avoiding anyone who dares endanger your operations, be it space pirates or the local law enforcement body.

Making a profit from the war going on around you is second only to staying alive and if so wished, the misfortune of desperate planets can easily be exploited for your gain.

PRODUCT

Privateer

SOFTWARE HOUSE

Electronic Arts

PRICE

£44.99

Optional Speech Accessory Pack £19.99

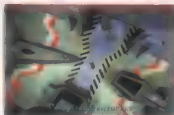
REQUIREMENTS

800 5.0, 4Mb Ram, 25Mhz 386,
256 VGA, Mouse, 270Mb Hard Drive

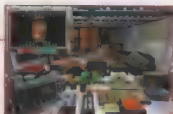
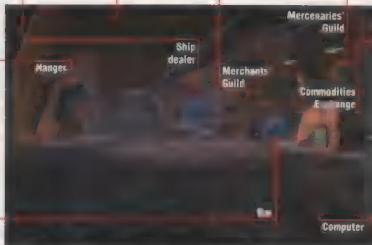
SUPPORTS

Joystick, Soundblaster, AdLib Sound Cards,
Speech Accessory Pack

REV
IEW



From this concourse you have access to all the amenities available in most bases. Some bases may not have a ship dealer to repair and upgrade your battered vessel, so bear this in mind if you're in need of essential repairs



In 1990 Chris Roberts and his team of developers unleashed the original Wing Commander game onto the PC market. Although much simpler in design than Privateer, Wing Commander gathered both favourable reviews from the press, and a rift following from sci-fi fans. An add-on disk called the Secret Missions became available some time after, and in 1992 Origin released the fully fledged follow-up, Wing Commander II. The release of Privateer makes the PC Wing Commander series one of the largest and most comprehensive packages available to PC gamers at the moment.

WHERE DO I SIGN?

Starting off clean is a safe bet. If you want to engage in illicit drug smuggling, then it may be wise to buy some decent armour and weapons. The thing is that they don't come cheap and money doesn't grow on synthetic trees.

Where do you start? Well, as a green Privateer, you begin your career on a space station in the Troy System which is a relatively quiet place in the Humboldt Quadrant. From here you can mix with the locals, accept a few easy missions and generally get to grips with your Tarsus merchant scout craft.

Inside this space station (and, indeed, inside many of the other stations within the game) you have access to various services. First and foremost there's the bar which is the centre for gossip, booze and general chat. Talking to the bartender may reveal an important nugget of information (the importance usually

here that you find most of your missions. The mission data has to be downloaded and it's then on to choose between those available – usually there's a choice of six missions ranging from search and destroy, cargo runs. More than one mission can be accepted at any one time and payment is automatic upon completion.

The Commodities Exchange area is where you can buy goods to trade. A sense of logic prevails here – if there's a type of cargo you need, then you will have to approach the correct installation to buy it. You've not got much chance of purchasing a couple of tons of grain from a mining centre have you?

Trading circles can be set up for a quick build-up of credits, for example buy some grain from an agricultural planet, sell it at a mining centre, then buy some plastic from the mining centre and return to the agricultural planet to

if, on the other hand, you pay the much higher 5,000 credits affiliation fee to the Mercenaries' Guild you are then authorised to access its mission computer. There are no cargo runs here, just pure death and destruction all the way!

Finally there's the Ship Dealer. This involves selling new and used vessels plus those all-important add-ons that make life in space so enjoyable! Your ship can be customised to suit your needs – extra power generators allow more powerful guns and shield systems to be used. Be warned: buying a Tachyon cannon may sound great on paper, but if, in the middle of a space battle, you deplete your energy as soon as you begin shooting you're going to look a little stupid, aren't you? This applies to any bolt-on extra that uses the ship's energy generator to power itself.

A full load of missiles is useful – Dumb Fire missiles are cheap but pretty much useless, whereas Friend or Foe missiles are expensive, but assure destruction. I'd go for the latter option if I were you.

Also it's advisable to buy a jump drive as soon as you can afford it because even though they are expensive, you won't get far without one. Radar and navigation software can also be upgraded whenever you can afford it, with the latter product being essential for system jumping and general navigation. ➤

"BUYING A TACHYON CANNON MAY SOUND GREAT ON PAPER, BUT IF, IN THE MIDDLE OF A SPACE BATTLE, YOU DEplete YOUR ENERGY AS SOON AS YOU BEGIN SHOOTING YOU'RE GOING TO LOOK A LITTLE STUPID, AREN'T YOU?"

comes to light much later into the game), whereas a bit of banter with some of the regulars may get you a juicy mission or two. Taking time to talk to people pays dividends in the end, besides you haven't got much to lose and you could miss out on something important.

On the main concourse you will find a palm print activated computer and it is

off-load it. It's a simple and efficient business.

You'll find that upgrading your cargo hold may reap even more profit if you choose the life of a space trader. Cargo runs are made easier by joining the Merchants' Guild. A fee of 2,000 credits allows access to its mission computer, plus other members of the guild can be recruited to watch your back.



REVIEWS



Upgrading your navigation and radar software is incredibly expensive. Quadrant maps are an essential purchase and without them your ship is incapable of jumping to systems in other quadrants



Loading ordnance before a mission should not be forgotten.

Missiles are a safe bet in a tight spot, especially Friend or Foe interception missiles which immediately locate the nearest hostile vessel and home in to both their shape and engine heat.

There's not much chance of evading these beauties!

➤ The most important piece of equipment in the game is your ship, for it is with this that you are able to conduct your everyday mercenary runs. When you initially set the game up you



part of private enterprise, the Tarsus is popular and easily available to merchants and mercenaries alike.

As you would expect from a lower class of cruiser, the Tarsus is kitted out

"CHOOSING THE SHIP TO SUIT YOUR VOCATIONAL NEEDS IS PARAMOUNT TO SUCCESS, SO BUY WISELY BECAUSE AT 200,000 CREDITS APIECE THEY'RE NOT CHEAP"

are provided with a Tarsus merchant scout vessel. The Tarsus was the mainstay of the Exploratory Services fleet until a few years ago, when it was phased out of service. Now a familiar

with the most basic of equipment. Visibility, especially through the small side windows, is low, making space combat a rather claustrophobic affair. The placement of the cockpit also

prevents any over-the-shoulder view, requiring frequent use of the available radar systems for target location. No slots are available for gun turret additions, plus the bulkhead supports only a level one shield upgrade, two gun racks and two weapon or tractor beam racks. Acceleration performance is average, but the large cargo hold makes up for this, particularly if you favour a trading role within the game.

As you progress through the various missions, your credit rating should rise. That is, if you're actually completing the missions and collecting the cash! Once you've managed to get enough credits together all you have to do is head to the nearest ship showroom and upgrade your machine.

Three alternatives are available: the Centurion, the Galaxy and the Orion. On the whole these offer significant upgrades in terms of visibility, weapons capacity and manoeuvrability. Choosing the ship to suit your vocational needs is paramount to success, so buy wisely because at 200,000 credits apiece they're not cheap.

GETTING TO GRIPS WITH THE HARDWARE

Cockpit layout varies from vessel to vessel, but all have a similar instrumentation set-up. On the right is a view from the Tarsus fighter with the cockpit display explained in full

While your ship uses energy in power most of its on-board systems, it does need a certain amount of fuel with which to jump from system to system. A full fuel load can accommodate up to five system jumps

The autopilot cannot be used if there is enemy activity in the immediate area, or if you're in the middle of an asteroid storm

The ship's power generator supplies a limited amount of energy which you can allocate to your craft's systems. Maintaining a balance between offensive and defensive systems is essential for survival

From here the pilot can check system damage, enemy status, target view, target identification, weapons systems and communications. Any contact with other space pilots (friend or foe) will be displayed here too. The Galaxy Class cruiser possesses dual MPDs for more efficient monitoring of the area



A broken square shows the current on-screen target. A closed square indicates target lock, and the diamond inside indicates missile lock

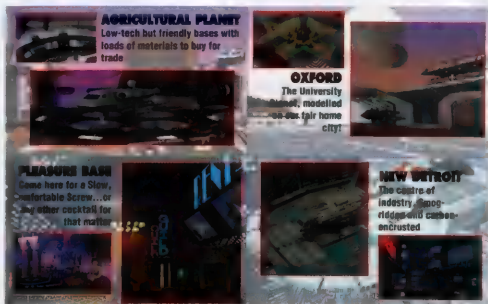
Non-intelligent weapons are slaved to the cross-hairs for aiming

Denote the current throttle setting and actual velocity

Used for navigation and to track other spacecraft within a certain range. Can be upgraded. Colour-coded dots indicate whether the other craft are hostile or neutral

Shields deplete with repeated bombardment but replenish given time. If your shields have been knocked out, then your armour is next in line for some punishment. If your armour is destroyed, so are you!

REVIEWS



IN SPACE NO ONE CAN HEAR YOU SCREAM

In space your primary objective is to get from your present location to your set destination – usually the place where your mission is located. To do this you must call up your navigation computer, check mission data, and set course for one of the navigation points within the

helpful for craft identification, but if you can afford more powerful radar software, your on-ship computer should be able to identify the target instantaneously.

Once you get to know the ships, you must then identify the crew. Retros, a

"BY THE TIME YOU ARE ABLE TO RECOGNISE THE DIFFERENT FACTIONS YOU SHOULD HAVE DISCOVERED YOUR PURPOSE WITHIN THE GAME (BE IT BAD OR GOOD) AND DECIDED WHICH CHARACTERS YOU SHOULD BE AVOIDING..."

system. The autopilot can then be engaged for a quicker journey. If you find yourself in the midst of battle or inside an asteroid storm you will be unable to engage the autopilot. Annihilating the enemy ships or weaving through the asteroids is your best bet.

If one of your missions is located in a different system (you begin in the Troy system) you need to buy a jump drive and quadrant navigation software. Once you possess both, the galaxy is yours. Various designated jump points are scattered throughout the systems and it is from these blue cloud-like areas that the jumps are made.

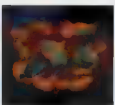
The space lanes are crawling with other ships. A guide in the manual is

religious cult of anti-technology worshippers, usually attack anyone unfortunate to fly too close to one of their sermons. Killratu fighters can be found stranded from the war zones and killing them is usually advantageous. Pirates are your main problem because they attack mercilessly in numbers, and are after only one thing – your cargo! Militia, the Naval Forces and other merchants also frequent the quadrants looking for a purpose in life.

By the time you can recognise the different factions you should have discovered your purpose within the game (be it bad or good) and decided which characters to avoid and which to trade with.



Pressing **N** while inside the cockpit brings up the essential navigation map. From this map you can set waypoints, check jump points, check mission details and monitor your progress. A larger map can be accessed showing an entire quadrant and all the available jump points



DOES PRIVATEER BEAT THE ELITE?

As a space trading game, Privateer boasts more than just a passing resemblance to David Braben and Ian Bell's classic Elite. This is no bad thing though, Privateer displays much of Elite's depth and longevity. Mission-wise, there's a lot to see in this game – with over 60 different bases spread throughout 90 solar systems, you're not going to discover all the game's secrets immediately.

As you become more confident and start to build up some decent kit, the game really begins to open up, especially after buying the jump drive. Exploration is involving and fairly exciting (although space is pretty empty!), which is a great relief considering that it's one of the game's prime features. It's rewarding to find a space station, especially if the graphics are new or different, as is the discovery of new character with which to converse.

In-space combat graphics are adequate on slower PCs and the jerkiness may put a few PC owners off, but play it on a recommended 486 DX2 and you're laughing. As in previous Wing Commander games most moving objects are scaled and rotated but become extremely blocky close-up. The still graphic screens, on the other hand, are all outstanding and they easily

"ONCE YOU'VE EARNED A FEW KILLS, SLAGGED OFF A FEW RETROS AND PUSHED A FEW DRUGS YOU SHOULD FIND YOURSELF COMPLETELY ENTWINED WITHIN THE GAME'S INTRICACIES"

outclass previous Wing Commander graphics, especially the rainy, Blade Runner-esque cityscape found on New Detroit.

Further adding to the atmosphere are the multitude of clear and crisp sound effects. Turn the volume up full and listen as a missile scorches from behind you towards its target. This is even more impressive if you take look from the missile camera! The speech accessory pack is great for inter-pilot banter, especially if you decide to piss the other guy off!

Once you've earned a few kills, slagged off a few Retros – "Traitors of humanity – feel our wrath!" works rather well – and pushed a few drugs you should find yourself completely entwined within the game's intricacies. Privateer is one of the those all-nighters that just can't be put down, so it may be a good idea to book some time off work before you decide to buy it!

SCORE ★★★★★



REVIEWS

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- Integrated digital to analog converter
- Extra-long connector cable

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SOFTWARE HOUSE

Activision

PRICE

£49.99

REQUIREMENTS

Dos 5.0 Min, 4Mb Ram 600k RAM free, 25Mhz 386, VGA, Mouse, 2.5Mb Free HD, CD Rom +150k/sec

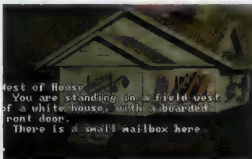
SUPPORTS

Soundblaster, AdLib, Roland, ProAudio Spectrum, Disney Sound Source, Cvox Speech, Tandy SL/TL and Sensation Soundcards, Mouse, Joystick

Behind House

You are standing behind the white house. In one corner is a small window which is slightly ajar.

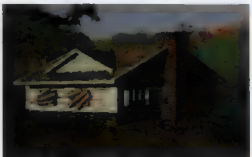
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West of House

You are standing on a field west of a white house, with a boarded front door.

There is a small mailbox here.



Return to Zork CD starts in the same way as the original Zork - with text on a black screen. Within seconds the shot changes to a white house. The view pans around to show the four walls of the building, it then zooms into the mailbox. Inside is the tele-orb and a sweepstake letter which is also included in the packaging

REV
IEW

YOU are standing behind the white house. In one corner is a window which is slightly ajar.

>Go southwest then go northwest

West of house

You are standing in a field west of the white house with a boarded front door. There is a mailbox here.

>Open mailbox

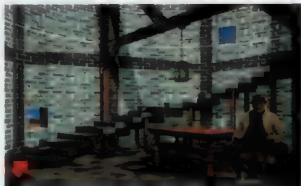
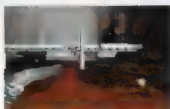
These immortal lines of dialogue opened the portal to the legendary land of Zork which, after five games and a decade of ground-breaking computer software, are still the most popular adventures of all time. Now with the arrival of Return to Zork (RTZ), the beautifully scripted parser has taken a back seat to the cinematic experience that brings Zork

into the '90s. With a cast list longer than your arm, RTZ is very different from the adventures I was raised on. Avid Zorkies will be left wondering whatever happened to the good old days when a text adventure was just that, and also why the bloke from The Wonder Years is screaming something in Trollish, while the Soundblaster works overtime to create the orchestral masterpieces that accompany each scene!

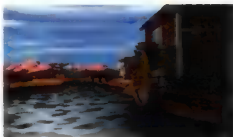
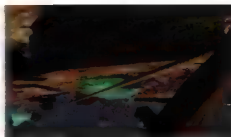
Oddly enough, Return to Zork starts in the same way as the original game - a few lines of text splattered on a black screen. Within seconds however, the CD kicks in with gorgeous 256 colour graphics as it pans towards the old white house, then across to the mailbox. This opens up and inside a tele-orb flickers to life. A man's face materialises, talking nervously about a sweepstake letter. Before he finishes his sentence, his face distorts and he's sucked into oblivion. The screen darkens and a view of an ocean and mountains appear as the camera pans gently over the rocky terrain.

To be honest I was stunned. Not by the excellent presentation but because this just isn't how I remember Zork. Graphics in an Infocom game is like real beef - fast food burger - practically unheard of! Mind you, I was eager to find out just how good the new generation of Infocom adventures were.

Out with the old and in with the new as some geezer once said, and it seems that Infocom has applied this rule to its



The lighthouse keeper is a bumbling old fool and can't remember a thing. Ask him about the road to the south and only return if you have a rock of Illuminyte in your possession



CD-ONLY RENDERED GRAPHICS

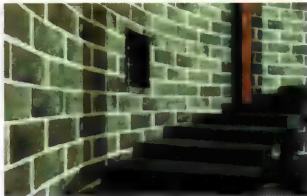
In the CD-ROM version of RTZ, certain parts of the game are separated from each other using hands-off animations that are graphically quite spectacular.

If you've got a fast PC, riding down a rapidly flowing river on a raft, or abseiling

down a massive cliff can produce impressive results.

Some of the images took up to eight hours to render, but it's hardly surprising when you see the end results. One of the most impressive parts of the game is when you are climbing along a tree branch,

your camera slides down the rock face, swinging from side to side. Also noteworthy are the stairs in the lighthouse (bottom right) which spiral smoothly up towards the roof, and the boat which bobs up and down (bottom left) as it floats to Canuk's shack.



games. About the only similarity between this and the other games is the place it's set in (Zork) and the appealing humour. Text input is a thing of the past, now there are mouse-driven icons that can walk, talk and even take pictures at the click of a button!

"TO BE HONEST I WAS STUNNED. NOT BY THE EXCELLENT PRESENTATION BUT BECAUSE THIS JUST ISN'T HOW I REMEMBER ZORK"

Mouse, joystick or keyboard can be used to control the on-screen cursor, although I'd recommend the first simply for ease of use. Anything of interest is highlighted when the cursor is moved around the screen, and a word or two describing what the object is also makes an appearance.

Moving from one location to another is simple, with red arrows indicating the possible exits and a single click taking

around with!

Pressing the mouse button will reveal a set of icons which allows interaction with the object. Picking up and placing items in your bottomless inventory is all pretty standard, but the icons are a lot more versatile than those seen in previous games. Rope can be tied around trees to make a dodgy bridge, drinking the milk from the Thermozz gives night-sight (!?) ➤



In New West Shanbu, everything from the general store can be picked providing you can get inside. Obviously the door is locked, so you'll have to find a piece of wire with which to pick the lock



The fairy keeps bugging the blind brewman. Give the milk to the brewman and get the fairy dusts for the spirit

ASK ABOUT ICONS

TALK: Click on the talk icon to begin a conversation

INVENTORY: Query a character about any item in your possession

TAPE RECORDER: Taped conversations can reveal some funny jokes

MAP: Maybe someone knows more about the road to the south?

PHOTO ALBUM: Have you seen this man? Maybe not, but someone else might have

END CONVERSATION: When you've had enough of their idle banter, click on here

OPTIONS DIALOGUE

SAVE: Save your game at the click of a button

SOUND: Toggle all the sound on and off

SCORE: How far into the game are you?

TEXT: Turn the text descriptions on and off

MUSIC: Forget about the volume, just turn the music off completely



EFFECTS: Switch the effects off, then back on again!

LOAD: Restore a previously saved game

RESTART: If things just ain't going your way, restart!

EXIT TO DOS: Erm, obvious really

WALK THROUGH: Turn off the video walk-through bits for a faster game

TALK ICONS

BE QUIET: If only life was a game everyone could use this on someone!

FASCINATED: Look fascinated and the characters will talk for hours

APOLOGETIC: It's time to apologise when a troll holds a sword to your throat

THREATEN: Wangle as much information out of someone by threatening them with your sword

BORED: If someone rants on and on, click here to indicate boredom

REVIEWS

Don't go to sleep in the hotel room unless you've got the Illuminaty rock. Otherwise the grues will creep in when the light goes off and slit your throat. Incidentally, watch the TV for a little light-hearted fun



► and if the sword is in your possession, anyone who dares to open their mouth can be attacked and killed. The downside to murder is that a big bloke steals all your possessions making it practically impossible to continue.

Three items which are always in your pocket are a Polaroid camera, a mini tape recorder and a map. Both the camera and the recorder are used purely to make a record of places and people visited. Later on puzzles have to be solved using the cassettes or photos, but I'm not giving anything away!

Like the rest of the game, even the

"LIKE THE ORIGINAL ZORK PRODUCTS, THE PUZZLES CAN BE REAL PIGS TO SOLVE. A LOT OF LATERAL THINKING WILL HELP, ALTHOUGH THE HINT LINE IS ALWAYS THE EASY WAY OUT!"

map is a breakthrough in technology. Long gone are the days when you had to scribe down every location on a piece of graph paper – now the map updates itself, noting down every scene visited so far. Finding out when, where and how objects are used is 50 per cent of Return to Zork, the rest is solving puzzles by interacting with the army of characters found throughout the game.

All of the characters in the game are played by actors, many of whom have appeared on TV over here in the UK (Check out the Cast of Thousands panel on page 43 for more info). Each of these acted out their scene, which was then digitised into the game.



Give the moody blacksmith Moodock's sword to clean. But watch out because although his prices aren't particularly high, he'll can you by giving you the wrong sword. Challenge his word and eventually he'll give in and return the true dwarfson sword



When confronted by one of the many people in RTZ, a conversation has to be started or questions simply have to be asked. Five facial expressions appear at the side of the screen, determining your response to the conversation. Some people need to be threatened before they talk, others will spill the beans if they are treated kindly.

Choose to ask questions and another icon box will appear which allows characters to be questioned about anything in your inventory, including pictures which have been taken, any recordings made or a specific

location on the Zork map.

Like the original Zork products, the puzzles can be real pigs to solve. A lot of lateral thinking will help, although the hint line is always the easy way out! Because of RTZ's size, it's not possible to complete it within hours...even days.

You may be able to find most of the locations and all the various objects, but working out what to do with them is a different matter entirely. Thankfully, there's enough detailed description, humour and variation to make RTZ a joy to play. In all, there are all the elements of a classic Zork game, but with smart graphics and sound.

Running from CD, the sound is excellent – obviously! The speech is clear and each scene has its own piece of music which is surprisingly good. I must admit that I'm a bit of a cynic when it comes to atmospheric music because a lot I've heard just doesn't fit the game's mood, but just let me say I was pleasantly surprised by RTZ.

The video sections are also quite good, but unless you've got a fairly quick machine (486 25MHz) they're a bit jerky. These things, however, are only graphical niceties, and after all beauty is only skin deep! It's the gameplay that counts and Return to Zork is good...no, great! Welcome back Zork, it's nice to see a familiar face. **SCORE ★★★★★**

THE WORLD

TROLL CAVERNS
To face the leader you'll need a light then prepare yourself for a vicious fight



CULTURE PITS
Kotien meal holds the key to these vicious birds of prey



CLIFFS OF DEPRESSION
The bonding plant will wither and die under the cliff's gaze



OF ZORK

NEW MILL

Out with the old and in with the new, a portal that leads back to Booe



NEW WEST SHANBAR

An alternative place can at first confuse, but rest assured there's nothing to lose



HERO'S MEMORIAL

What hero is the memorial for? Not you matey, that's for sure!



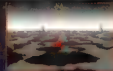
FOOL'S MEMORIAL

Remember life is one big laugh - so get the book and don't look daft!



CREEPING BOGS

Without a stick you'll come unstuck, sucked right under and drowned in muck



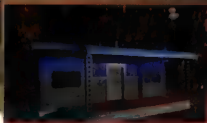
PUONEY'S RANGE

Farmer Pagny is in quite a mood - his Scottish accent no one understands



SHOOT & FARM

Rebecca Sweet packs a powerful punch, your nose will suffer when it comes to the crunch



CANUK'S SHACK

The evil Canuk has come unstuck, he's turned himself into a duck!



FOREST OF SPIRITS

Lurking in the trees on a moor, a spider spins his web of fear



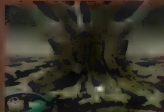
RUINS

Solve the puzzle of 12 tiles, to cast a light for many miles



EAST SHANBAR

At first the blacksmith is quite gruff, but deep inside he's not so tough



WITCH ITAH'S HUT

Witch Itah is quite a scream, her mystic chants will make you dream



WHISPERING WOODS

Follow the bats both left and right, and drink your milk so all is bright

There are over 100 locations in *Return to Zork* with approximately 50 puzzles which need to be solved. Some of them are easy, others are difficult, but all of them however, will probably rack your brains until the solution becomes clear. How long would it have taken you to work out that the blind woman can only be cured with warm milk?

The actors were posted into the game in the same way many special effects are done in movies. The actors were filmed using a colour-separation overlay technique (also known as blue-screen) and were then incorporated into the ray-traced backgrounds. Correct lighting and effects were vital to the presentation of the finished product as atmosphere is very important in *Return to Zork*.



Lighthouse

LIGHTHOUSE
To keep the lighthouse shining bright, find a rock of Humbletye

DWARVEN MINES
Don't walk inside without a light, or your doom is sealed without a light

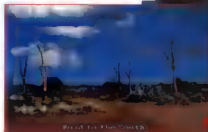


Dwarven Mines

MOUNTAIN PASS
At the mountain pass you'll see, a bonding plant just for thee



BIG TREE
Tie rope around the big tree bough, to make a bridge to cross right now



Road to Lighthouse

ROAD TO THE SOUTH
The lighthouse keeper does declare, "I don't think you want to go down there"



OLD MILL
Old Boes will offer a glass of rye, but drink it and prepare to die!



Bel Naire Temple

BEL NAIRE TEMPLE
The Holy Woman's sacred word, will bless the mighty dwarven sword



WEST SHAMBAR
His Peepers' questions will seem much easier, with the Zerk Encyclopaedia

ANCIENT RUINS
Seven objects within your horde, are needed to worship the Holy God



ANOTHER ZORK, ANOTHER TIME

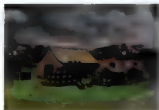
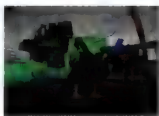
**REV
IEW**



Watch Ben carefully as he ties the cow-hitch. You'll need it later on in the game to tie a rope bridge from the lighthouse to the big tree across the river



Canuk changes you into a duck so you can fit inside the ship-in-a-bottle and recover another piece of the disks you so badly need



CAST OF A THOUSAND CHARACTERS



WIZARD TREMBLE

Played by Will McAllister.

Will has featured in a variety of Disney films including *Midnight Daddy*, *Dark Exodus*, *Colour of Evening*, *The Film and Cave Girl*. He also played Doctor Lester in the American TV series *The Munsters Today*, and Arthur Molesworth in the comedy series, *Not Necessarily the News*.



LIGHTHOUSE KEEPER

Played by Howard Mann. You can see

Howard Man in the newly-released video *Mr Saturday Night* where he plays Billy Crystal's manager, Charlie. Howard has also starred in numerous television series including *Hooperman*, *Murder She Wrote* and opposite Bruce Willis and Cybill Shepherd in *Moonlighting*.



WAIF

Played by Edan Gross.

Edan started acting at the age of five and since then has notched up a number of impressive roles. TV roles include *Northern Exposure*, *Herman's Head* and *Murphy Brown*. He has starred in *Best of the Best I and II* and he's also the voice behind *Chuckle*, the psychotic doll in the *Child's Play* trilogy.



MAYOR

Played by Raoul Risk.

Teensters will have no doubt gaped at Raoul when he appeared in *Beverly Hills 90210*, as well as *Santa Barbara*, *Growing Pains* and *Unsolved Mysteries*. He has also gone 10 rounds with Hulk Hogan in the box office flop, *Suburban Commando*.



BOOS MYLLER

Played by Harold Smith.

He may look old, but Harold is a rocker at heart, having starred in numerous music videos for the likes of *Man in Black* and *The Cars*. He is also well-known for his role as Corky in the movie, *Texas Trilog*.



MOODOCK

Played by Ernie Lively.

They're about to make the Beverly Hills motion picture and Ernie will be co-starring in it. He's also been in film movies like *Air America*, *Passenger 57* and *Turner and Hooch*.



BLACKSMITH

Played by Michael Stadvec.

The blacksmith has been reunited with the mayor after they appeared in the TV show *General Hospital* together. He's also quite famous as a stage actor, having landed roles in several theatre productions including 1-800-SAVE ME and *Where Has Tommy Flowers Gone?*



REBECCA SNOOT

Played by AJ Langer.

AJ has appeared in the leading roles of *Grey Night* and *People Under the Stairs*. She makes regular appearances on American TV on shows like *Nickelodeon Sports Desk*, *Blossom* and *My So-Called Life*.



GUARDIAN

Played by Charles Carpenter.

Remember *Tank in the TV sitcom Saved by the Bell*? No? Well neither do I, but I'm assured that Charles played his part. Additionally he can be seen in the television magazine show, *California Dreams*.



TROLL LEADER

Played by Jason Harvey.

I reckon virtually everyone will have seen Jason in *Channel 4's The Wonder Years*, when he played the lovable knuckle-head Wayne Arnold. This up-and-coming star has also starred in movies such as *Meet the Fuggites*, *Back to the Future*, *Pee Wee's Big Adventure* and *Police Academy*.



WITCH ITAH

Played by Michelle Dahlin.

Featured in the films *The Colour of Evening* and *Save Me*, Michelle has guest starred in

Unsolved Mysteries. She has performed in various classic theatre productions including *Taming of the Shrew*, *Sweeney Todd* and *Merchant of Venice*.



CANUK

Played by Jojo Marr.

Jojo landed himself with a role in the vastly underrated *Snakers*, and has also appeared in minor film successes *Miami on Ice* and *Another Day*. He, like so many of the other actors in *Zork*, has a fruitful theatrical past, having been cast in *Jesus Christ Superstar* and *The Crucible*.



FAIRY

Played by Robin Lively.

Robin Lively is the young starlet who has starred in *Karate Kid III*, *Wild Cats*, *Teenwatch* and even had a role in David Lynch's superb *Wild Peaks*. You'll also find her acting in TV programmes like *Doodle Howser*, *Young Indiana Jones* and in *Sickness and In Health* – although not with Alf Garnett!



BOWMAN

Played by Sam Jones.

Sam has starred in over 40 action movies but is probably best known for his lead role in the film *Flash Gordon*. He has also appeared in *Maximum Force*.



TREE SPIRIT

Played by Lori Lively.

Yet another member of the Lively family, Lori has appeared on TV in programmes such as *Falcon Crest* and *Working Girl*. She has also starred in stage productions of *Grease* and *Evita*.



HOLY WOMAN

Played by Julie St Claire Capone.

Along with *Dracula's Gary Oldman*, Julie starred in the motion picture *Sid and Nancy*, not to mention her leading roles in *Murder She Wrote* and *Santa Barbara*.



A HISTORY OF ZORK

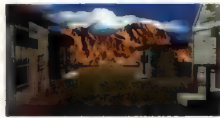
Believe it or not, the first *Zork* was released over a decade ago. It was created by Dave Lebling and Marc Blank who have worked for Infocom since the beginning, writing classic adventures such as *Zork I, II and III*, *Enchanter*, *The Lurking Horror* and more.

Although these text-only adventures may look lame compared to today's standards, the quality of the parser was second to none. Detailed descriptions created the game environment because Infocom thought it was better to allow the gamer to create their own image of the game rather than draw it for them like other adventures around at the time did.

So even after all these years, it's worth looking out for any of the old Infocom titles because they provide hours of entertainment at a bargain price. As a matter of fact, Activision has bundled 20 of Infocom's classics in a package entitled *The Lost Treasures of Infocom (TLT)*. Squeezed onto five high density disks and costing a mere £45.99 (that's just over two quid a game!), TLT includes the first five *Zorks*, *Hitchhiker's Guide to the Galaxy*, *Planetfall* and a lot more. Offering superb value for money, this is one compilation well worth checking out.



The top shot is from the CD version of *Return to Zork* which is quite different to the same location on the floppy disk game (below). Although the floppy screen is more colourful, there is far more detail in the CD-ROM scene.



RETURN TO ZORK ON FLOPPY

The floppy version of *Return to Zork* will appear on 12 three inch disks and will take up 25Mb of space on your hard disk. In terms of gameplay, the versions are identical – the only difference between the two is the presentation. If you've installed *Return to Zork* from floppy, the characters aren't quite as animated as the CD version and the video sequences have been left out. There are also a few minor alterations on some of the locations, but all in all it's just as good!

SCORE ★★★★★

REVIEW

AS GAMES

BECOME

MORE

COMPLEX,

DOES THE

386 HAVE

by

LONG AS THE

Standard?

STANDARD?

THE recent boom in the UK PC market and the subsequent boost for PC entertainment software has been partly due to the sheer number of cheap machines readily available. 386 based systems aimed squarely at the home have long been available from Packard Bell, Amstrad, Commodore and Amiga as well as numerous retailers and wholesalers. But are these systems enough for the latest state-of-the-art products?

For some considerable time it was argued by many that the 386 would become the industry standard and that it would remain established in this position for years to come. Sounds familiar? A couple of years ago we heard the same thing about the 286. As we begin to see the next wave of leading edge products it's already obvious that the 486 has well and truly arrived as a viable entertainment platform.

It is obvious why this situation has come about - more powerful machines have reduced dramatically in price over the last year. But what of the machines which everyone owns at present? Are they really going to be obsolete within the next year?

With modern simulators, it seems that developers now feel that the equation $\text{POWER} = \text{REALISM}$ is one of the most important considerations. To produce something as accurate as possible, the power required to create the mathematical models is becoming greater. The 486 offers far more than its less powerful counterparts as it includes a floating point maths co-processor which helps to alleviate the strain.

With products such as Strike Commander demanding the extra power that the 486 offers, will other games soon follow suit? We spoke to developers and software houses to find out what the future for games would be...

is
your
386
ENOUGH?

**FEAT
URE**

DAVE WILSON ELECTRONIC ARTS

"Origin is a US company, EA is a US company, many of our subsidiary companies are American, so it would be safe to say that we do tend to cater for the US domestic market which is typically more power based than Europe.

Origin develops games specifically for leading edge technology, so you could say that it develops titles which help to sell the latest hardware. It's part of Origin's very ethos to produce state-of-the-art products. *Strike Commander* was criticised for being designed specifically for the 486 DX, but why did it receive all this criticism? It was a product designed to showcase the latest technology and it achieved this aim very well.

Origin is one of those developers which will take the latest technology on board very early – it's using Pentium already and really wants to push the machine to its limits.

It's in EA's interest to market products which will work on lower spec machines, but to get the best experiences you really need the power. Our current line is all geared to at least 386 to be user-friendly, but this will no doubt change eventually.

Thankfully, we don't need to cater for the 286 anymore, although I know some software houses feel this is still necessary. Many games will run on a 286 (you can turn down detail levels to improve the frame rate and so forth), but a low spec machine really won't cut it these days. Basically, you need a beefy machine to get the best out of the products.

This is a very fast-moving industry and technology sells. Look at *Wing Commander* and *Wing Commander 2*, for example – at the time the 286 was a big machine and these games really pushed the hardware to the limits, but they still sold exceptionally well due to people being attracted to state-of-the-art games. Similarly *Strike Commander* was attacked for being a 486 product, but it's one of our biggest-selling games ever, having shipped something in the region of 150,000 units already.

Electronic Arts will continue to bring the best possible product out and I think that in the very near future the market will settle down with a machine which is 486 based. I know it's unfortunate for all the 386 owners, but it's just the way things are progressing."



PETER MOLYNEUX BULLFROG

"I don't think that processor power actually matters that much, to me it's the speed of the video card which makes all the difference. It doesn't matter if you've got the latest high-powered processor – if you've got a crappy video card with a puny amount of memory on it, you're stuffed. The difference in speed can actually be anything up to four times on the same spec machine!"

These days we develop for at least 386. *Syndicate* was a product which was designed for a 25MHz 386 and all of our forthcoming games – *Creation*, *Theme Park* and *Magic Carpet* will need

"THE 486 WILL SOON ESTABLISH ITSELF AS THE INDUSTRY STANDARD, WHICH IS GOOD BECAUSE IT'S THE FIRST UPGRADABLE CHIP"

at least a 386. To get the most out of them though, you need a video card with a Local Bus and at least 1Mb of video memory on board so you get the optimum graphics performance.

The 486 will soon establish itself as the industry standard, which is good because it's the first upgradable chip. If you want the latest in power you can simply pull out your processor and replace it with the latest thing. Having said that though, I think Pentium (or the 586 or whatever you want to call it) is still a long way off as far as home users are concerned. It is just too bloody expensive to tell the truth and until it's considerably cheaper no one will really develop for it in the entertainment field.

For *Bullfrog* the 486 is the optimum, simply because it gives us the power and the ability to hit the US market. However, we do have to ensure that all our staff will work on a 386 machine so we don't alienate our home market.

If you want to improve your PC's performance for games, it's definitely worth looking into a new video card. In many cases it can improve performance at least twofold."

SEAN GRIFFITHS MIRAGE

"We aim very much at the higher end of the PC market, primarily due to the fact that we have to tackle the US market as well as the UK. In the States technology sells, so if you produce a high-power product it'll sell over there. We tend to write for at least 386 machines and our first product, *Rise of the Robots*, and future projects including *Adrenaline Factor* will need a 486 to be seen at their best. *Rise of the Robots* will be published in two forms – a VGA version will be aimed at the 386 whilst our *SVGA* game will be 486 only.

To be honest with you, I know the processor thing is something which worries people but there are other things I'm more surprised about. Why isn't *SVGA* more established? Anyone who's bought a half-decent system in the past year or so – something that's designed as a Windows station – is bound to have a 486, 4Mb memory and at least a half-meg *SVGA* video card. Why aren't more developers using this? *SVGA* games look bloody amazing and the user base is there.

Developers have to keep ahead of the technology. As far as games go the PC is still relatively young and it's only

recently that people have started to take this side seriously. The technology is moving very fast and it's only now that it's starting to settle down. The 486 will be around for longer than its predecessors, having been around a while already – it didn't just show up yesterday, you were able to buy a 486 machine quite a while back. The 386 may have become established, but it just doesn't cut it for the leading edge stuff."



**FEAT
URE**

CHRIS ROBERTS ORIGIN



► The following quote was taken from Chris Roberts' "A Game Designer's Apocalypse" comment in the Strike Commander manual...

"To make RealSpace truly revolutionary we decided to gamble on two major graphics techniques: gouraud shading and texture mapping. Both of these techniques are used extensively on high-end military flight simulators costing millions of dollars. Their application gives rendered 3D images a much more realistic and fluid appearance, but because of the power needed to implement such a 3D system nobody had previously dreamed of doing so on a PC.

For us to pull this off in software we knew we had to make some risky assumptions. First, that the power to price ratio of PCs would continue to

"TO PRODUCE THE BEST GAMES WE HAVE TO WRITE FOR AN OPTIMUM FORMAT AND AT THE MOMENT THAT HAS TO BE SOMETHING LIKE A 486 DX 33MHZ"

decline, thereby delivering affordable PCs of adequate speed to our target market. Second and more importantly, that the same forces that had created a demand for Wing Commander (those power hungry 386 owners) would generate a demand for games that exploited the next generation of PCs, the 486. When creating Wing Commander there were many who doubted the game would sell because of their lack of faith in the high-end PC market. This time however, everyone believed in the market and as time went on the doubts revolved around our ability to create the engine."

MARTIN KENWRIGHT DID

"These days, to produce the best games we have to write for an optimum format and at the moment that has to be something like a 486 DX 33MHz. In the States this is within the basic system format, it's amazing how many high-powered machines they've got out there. With all our current projects the

486 is what the game will run BEST on. We do make allowances for lower spec machines, simply losing detail at the expense of speed.

Something like TFX will run fine on a 386 DX, but if you really want to see something impressive you need to see it on a Local Bus 486 DX2 running at 66MHz – the effect is unbelievable. That sort of power is getting cheaper and that's the way that things are going. Having said that, if anyone really wants to improve the performance of their 386 they'd be much better off investing in a fast video board – it can improve the performance by up to three times."



WHAT NEXT?

At the moment the market seems to be in a state of equilibrium. There aren't an enormous number of processor-hungry applications in the games sector at present, but the number is growing gradually and is set to explode during 1994.

If simulations are your forte, it's probably worth considering an upgrade if you're using a 386 at the moment. If you can't stretch to the £350 (approximate price) of a replacement mother board, coupled with the hassle of fitting it, you could do far worse than find a fast video card to upgrade your system. Cards are available from most retailers and it's worth contacting a firm such as Evesham Micros on 0286 765500 or Memory Direct on 0800 636679. A Local Bus graphics card should set you back no more than £150. If you're buying a new PC it's definitely worth specifying Local Bus as an option as it often costs as little as £50 when included in a complete system. ■

WHAT DO YOU GET FOR THE EXTRA POWER?

The wonders of the 486's speedy operations have been dwelled upon in numerous computer magazines for a long time, but how does the chip effect the new wave of high-

quality PC entertainment such as adventures or simulations?

One of the major demands on a processor is the complexity of the graphics. New

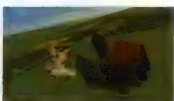
techniques such as image scaling, gouraud shading and bitmapped polygons place an enormous strain on the processor, requiring it to spend far more time updating the screen...



Graphics scaling is something which is cropping up in an awful lot of games lately. Originally found in the highly acclaimed Wolfenstein shareware product, the system has been refined in games such as Ultima Underworld 2 and the forthcoming Shadow Caster from Origin (which incorporates full-screen scaling). Pixels in the 2D image are swollen in a specific pattern to create the illusion of 3D movement. With complex images (such as the bitmapped walls, floor and ceiling in Ultima Underworld 2 – see screen shot above) the process eats up an enormous amount of graphics processing time.



The ground effect in Microprose's Horror sim makes extensive use of the gouraud shading technique. Rather than creating simple polygons to move around, this technique allows objects to be shaded in more realistically, whilst at the same time 'smoothing' the edges. Two points on a polygon are fixed and a colour is assigned to each. The gouraud math calculates all of the increments in the change of colour between the two points. This effect is often coupled with a fixed light source which helps to create a far more realistic look – the gouraud shading is adjusted in relation to the polygon's orientation to the fixed light source.



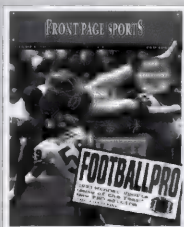
Strike Commander is another example of good use of gouraud shading (both the ground and the aircraft), but this is complemented by another graphics technique – bitmapping. The basic polygon image is taken, shaded and then detail is bitmapped onto the polygon surface. The calculations required to keep track of this detail is one of the many reasons why the game runs so slowly on most machines. If you take a look at the screen shot above, you'll notice the technique used on both the F-16 (camouflage, engine details etc), the fields and the ancient castle. Quite impressive really, but the power required is enormous.



Aside from the aesthetics which require intensive calculations, the overall simulator 'world' often eats into processor time. Not only does your position within the landscape have to be plotted, it also has to calculate the position and orientation of other objects moving around. In many older sims the calculations were performed but the images weren't displayed until quite close. However, the model in TFX allows all other objects to be tracked visually. The 'military model' requires an awful lot of math to create the 'virtual' world – temperature, weight distribution and density are all factors which contribute to the realism.

**FEAT
URE**

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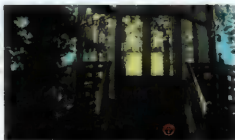
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PC110

A strange building indeed. How do I open the doors? Unlikely and illogical combinations sometimes lead to the answer...



Free Yuruba from his chains and he will reward you for your trouble

WANTED: SPECIAL AGENT

by

TO JOIN TIME POLICE

Paul

SEARCH FOR DANGEROUS

Mallinson

TRACE ELEMENT.

APPLY WITHIN...

LOST IN TIME

DORALICE Prunellier is an attractive, young, female pilot who enjoys flying to far-flung continents looking for excitement and adventure. She only uses tools, never weapons, loves strong alcoholic drinks (!), is mad about eggs (!!), likes to listen to jazz and is hopeless at playing bridge. A person worthy of this many exclamation marks surely must be something special, and French software publisher Coktel Vision seems to think so - Lost in Time being the first in a series of interactive stories starring heroine Doralice.

Dora, as she will now be called, hates to use violence - Lost in Time is virtually violence free, with Dora preferring a more creative and

PRODUCT
Lost in Time
SOFTWARE HOUSE
Coktel Vision
PRICE
£44.99 (CD-ROM version to follow)
REQUIREMENTS
Dos 5.0 and above, 640K RAM, 16MHz 286, 256 VGA, 9Mb HD Space, Mouse
SUPPORTS
Soundblaster, Adlib



I managed to make Galipo the parrot feel sick. Mind you, it took a couple of hours and the tearing out of a few handfuls of hair before I finally discovered the solution!

"LOST IN TIME IS VIRTUALLY VIOLENCE FREE, WITH DORA PREFERING A MORE CREATIVE AND CONSTRUCTIVE ROLE IN THESE ADVENTURES RATHER THAN A GUN-TOTING, MACHO APPROACH"

constructive role in these adventures rather than a gun-toting, macho approach.

In 2092 Jariath Equis, eminent historian and all-round bad dude, stole a

valuable sample of Americium 1492, a newly-discovered trace element of enormous power. He hid this radioactive material in the past, endangering the

equilibrium of the time continuum. The space-time police are assigned to the case but need a special agent to stop Jariath and his evil plans...

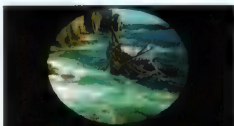
Lost in Time allows you to relive the

mission in the role of Doralice Prunellier, selected for this mission by the central computer of the space-time police due to her historical ties with Jariath Equis.

At the beginning of the story Dora awakes from unconsciousness to find herself trapped inside the bilge of a storage boat. She doesn't know how she got there or who she is, and it is your job not only to regain both her freedom and her memory, but also to help her to capture Jariath before he destroys all of time and space itself. A fairly complex task for a pilot, as I'm sure you'll agree!

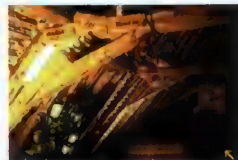


This is Doralice Prunellier - self-confessed egg sucker and whiskey drinker. It is your destiny to follow her on a mission through time and space



What's that over there? Is it the Green Tachit of the Devil, or a shipwreck?

At one point in the game you will get the opportunity to look through a telescope to see what you can find. The effect is outstanding - touches like this make the game more enjoyable to play



The crypt hides no corpses, just a few useful items. I was stuck here for quite a while so here's a bit of a clue: Roll out the barrel, we'll have a barrel of fun...

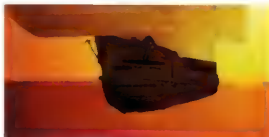


Trapped on a pirate ship. Maybe this flag will come in handy elsewhere in the game? Lost in Time requires a fair amount of forethought - difficult I know, but challenging non-the-less

**REV
IEW**

The Koktail development team certainly managed to create a believable atmosphere for *Lost In Time*

THE MAKING OF AN INTERACTIVE ADVENTURE MOVIE



Muriel Tramis has worked at Koktail Vision for over five years as project manager and scenario writer for games such as *Goblins 1* and *2*, *Fascination* and now *Lost In Time*. A swift French-to-English translation later, and we had a few words from her regarding this new release.

Q What can you tell us about *Lost In Time* and its creation?

A *Lost In Time* is a new type of game software – the Interactive Adventure Movie, in which the game is created just like a film. First I wrote the scenario, then we cast the actors, visited different places in Brittany and

Perigord, before renting the places and objects required – all in order to start the filming.

What is extremely important is for the game to be completely interactive so that the player feels completely free to move in a non-linear world. I think we have

"LOST IN TIME IS A NEW TYPE OF GAME SOFTWARE – THE INTERACTIVE ADVENTURE MOVIE, IN WHICH THE GAME IS CREATED JUST LIKE A FILM" – MURIEL TRAMIS

succeeded in doing this; when you play *Lost In Time* you enter 30 different worlds in which you can travel anywhere you like. The three graphic techniques are perfectly adapted to the idea of travel through different places and periods.

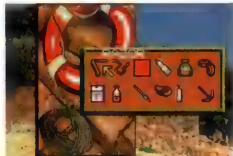
Q Was there any special reason for choosing a female hero?

A I thought it would be nice to have a female in the main role for a change. Looking at cinema today, there are more and more exciting female parts, such

Q What can you tell us about the scenario?

A I have a passion for everything to do with science fiction, and am particularly fascinated by the idea of travelling through time and all the

paradoxes involved in this. I had a great time conceiving the strange contradictions seen within the game. One example can be found when Dora is surprised to find an object in a certain place – it turns out that she put it there while trapped in the past!



The inventory can hold many objects. If you're stuck, call it up and study the held items – the solution may eventually dawn on you



Opening the cupboard there's a damaged fuse. Obviously it needs to be fixed, but when it's been mended what will it power up? These are the things you should think about when playing *Lost In Time*



The portrayal of the black natives in *Lost In Time* leaves a lot to be desired. Why didn't the programmers go the whole hog and stick bones through their noses?

LEAVE YOUR JOYSTICK AT THE DOOR PLEASE

Lost In Time is a point and click "interactive adventure movie" (so the box says) with every action controlled by the press of a mouse button. An on-screen pointer can be moved freely over the background images, highlighting any objects that can be interacted with. Clicking left, over an object picks it up, whereas clicking right while handling an item adds it to your inventory. Searching through every location for even the smallest of clues is essential for Dora's continued success.

Lost In Time is essentially a puzzle game. Dora must solve complex problems by using and manipulating various objects she finds. I wouldn't like to give too much of the game away, but an early example of this style can be found when Dora attempts to escape from the hold of the ship; first she finds some oil inside a barrel, then she uses the oil on the rusty handle of the hand pump in order to bail out the knee-deep water, which in turn reveals another helpful object...and so things progress. You get the idea.

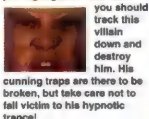
A PILLAR OF THE COMMUNITY

To solve the riddles of *Lost In Time* you will have to converse with a number of characters featured in the story. Professional actors were employed to play the characters, again with digitised video footage being used to convey

the action with varying degrees of success.

Most of these characters are there to aid you, so be nice to them and you may receive something in return for your kindness – unless of course they're out to kill you.

JARLATH
Jarlath is definitely NOT in this game to help you! By piecing together vital clues

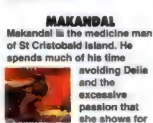


MELKIOR
Melkior, secret agent of STOP (Space Travel Operational



Police), is slightly scatterbrained and is constantly losing his investigation notebook while on the lookout for Jarlath. This is his

first mission and Dora will meet him quite early in the game.
YORUBA
Descendant of a sect of Egyptian magi, Yoruba is the guardian of his tribe's treasure; the sarcophagus of the Pharaoh Amenotep. He has been enslaved by Jarlath and locked away on his boat. Yoruba is the lover of Velvet, Jarlath's wife.

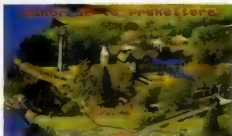


him. A dreamer, Makandal can be easily bribed to provide useful information.

DELLA
A clairvoyant who spends most of her time concocting love potions to arouse Makandal. Della is a good friend of Velvet, and it is she that will help Dora find Jarlath's wife towards the end of the game.

VELVET
Jarlath's wife. He has married her merely to inherit her plantation on St Cristobald Island. Neglected by her husband, she fell in love with Yoruba.

REVIEW



Each of the game's three time zones has its own particular map. These can be called up from the hidden icon bar at the top of the screen

► Some of the later puzzles become very complex and vague – I don't know about you, but I found wiping a rum bottle label with a foam sponge to find a set of time-travel co-ordinates just a tad obscure to say the least! This type of problem does increase game longevity, but does nothing for the game player's nerves.

To relay all the important information to the player, the display has been split into four sections from top to bottom. When the cursor is brought to the top of the screen an icon bar appears revealing six options. Here you can save your progress, ask for help, check your inventory, call up a map, scan through a notebook and set game options – for a full explanation of these options, check out the illustrated diagram elsewhere on this page.

Further down the screen (in the centre, to be precise) is the main play area. Everything that can be seen or done will be found here and it is inside this central area that cursor changes indicate possible direction changes. If you move the cursor to the far left and it

turns green, you will be able to rotate in that particular direction. Walking forward is simply a case of clicking either on the centre of the screen or on the object you want to walk towards, the environment then updates in a flowing, animated manner.

A dialogue box takes up the third quarter of the play screen for all those annoying messages that ramble on about the story-line, and the bottom line displays all selected objects, places and characters that appear throughout the game.

"LOST IN TIME DOES HAVE A FEW PROBLEMS IN THE GAMEPLAY DEPARTMENT. SOME OF THE PUZZLES, ESPECIALLY THOSE FOUND IN THE LATTER HALF OF THE GAME, ARE INCREDIBLY DIFFICULT TO FATHOM OUT"

Everything is mouse-driven so no keystrokes are needed in order to play. This results in a quite superb game engine, the game being extremely user-friendly and intuitive, even when the puzzles become incredibly difficult – it doesn't make solving the puzzles any easier though! This user-friendliness is one of the game's best features.

TIME FOR A SHARP EXIT

Lost In Time is superbly presented, both in terms of graphics, sound and ease of use. As I enthused earlier, the control system has been very well thought out (though you've had it if you haven't got a mouse), and even when you save the game the program automatically saves it with the current location name.

Sound effects and music, even on the floppy version are superb – the creaking oak timbers of the ship's buoyant skeleton create a nautical atmosphere right from the word go. Spot effects are usually digitised for

authenticity, and your own shuffling footsteps make the process of movement just that bit more interesting and realistic. The forthcoming CD-ROM version features full speech and extra FMV sections.

Lost In Time does have a few problems in the gameplay department. Some of the puzzles, especially those found in the latter half of the game, are incredibly difficult to fathom out, with the strangest of object combinations usually turning out to be the most successful! The joker icon is available to supply the player with 'hints' – I say 'hints' because they more often than not completely give the game away! – but they are limited to three in a single game. To avoid players cheating by saving the game, reading the joker, then reloading, the program detects how many jokers have been used since installation. If you use all three jokers on the first three puzzles then they're gone for good, unless you re-install the game, and that WOULD be cheating. My only advice would be to use them very sparingly and save them for later in the game because you'll need them!

If it wasn't for this niggling problem, Lost In Time would fare a little better. Having played through the entire game I was surprised to discover just how short it is. The game does provide hours of play, but a high proportion of this involves aimlessly wandering around looking for things that you probably don't need anyway. If you're extremely good at point and click adventures and prefer a more sedate story-line to your games, then Lost In Time is exactly what you've been looking for. Personally, I found the lack of sex, violence, guns and dead bodies extremely disturbing. **SCORE ★★★★★**

KEEPING YOUR OPTIONS OPEN

The icon bar at the top of the screen has many useful game commands and can be called up by simply moving the cursor above the main play area.



The notebook not only lets you type in the clues you want to remember, but gives you a step by step résumé of the story. All the important documents you find, as well as the dialogues with the other characters, are automatically saved and can be consulted whenever needed

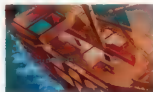
Up to three jokers can be used in a game. This joker option will tell the player exactly what they're supposed to be doing in this particular part of the game



Save the game in any one of the 30 save slots provided. When you save the game the computer automatically calls the file by your current location



To use one object on another, select the desired item and drag it up to this icon. Enter the inventory and click on the second item. If both objects can be made into something useful it is done automatically

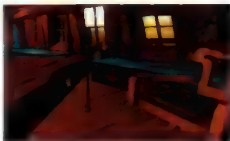


The map allows you to get an overall view of the areas you can visit and allows direct movement between the locations already discovered



With this option you can see exactly how far you have advanced in the game and how much time has been spent getting there

**REV
IEW**



PRECALCULATED 3D GRAPHICS

The 3D precalculated drawn sequences are the first you come across. They are found mostly inside the pirate ship, allowing semi-realistic movement in any direction. Animation between locations is superbly executed (almost of CD-



ROM quality in places) and is very atmospheric. This graphical style is my favourite of the three.

(Above left) Clicking on isanimate objects may reveal hidden secrets. The desk drawer is an obvious



place to search, but what will happen if you look very closely at the chair?

(Above left) If you click on an object for a closer view but don't find anything, try clicking a second time. Missing that all-important item can be very frustrating

(Left) is the precalculated 3D world you are treated to animated close-ups of any useful object that may be lying around the place. Here I've learnt over to examine this bucketful of water more closely - a detailed window appears to relay the action

LET'S TAKE A TRIP TO NOVELTY ISLAND!

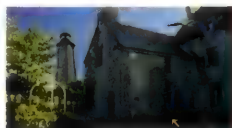
GRAPHICALLY, *LOST IN TIME* BOASTS A MULTITUDE OF DIFFERENT STYLES TO COMPLEMENT THE TIME-TRIPPING NATURE OF THE GAMEPLAY. EACH OF THE THREE TIME ZONES ARE RENDERED IN A DIFFERENT MEDIUM, RESULTING IN A NUMBER OF STRIKING ACTION SEQUENCES

FULL-MOTION VIDEO (FMV)

The second part of the adventure consists purely of digitised video footage. While not strictly FMV as claimed by the box, the use of this video footage remains an impressive testament to the game designers' versatility. When all the locations had been chosen, a film crew travelled to Brittany to shoot as much video footage as possible. They returned with hours of videotaped material, edited it down and digitised the completed sequences for inclusion in the game. The effect results in a realistic-looking but rather static environment - all the locations are digitised stills with only short action sequences animated to any extent.



This still video image is typical of the graphical presentation of the second part of the game. Nothing moves until you start rummaging around the place. Taking a peek inside the tractor will call up a series of FMV sequences, as will the conclusion you come to regarding the horse-blocking-the-gate problem



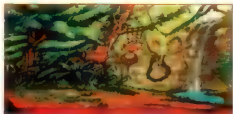
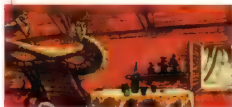
The exterior video sequences for *Lost in Time* were all shot on location in Brittany. The game's producers rented this old manor for a short period of time in film the footage they needed. The manor in the game isn't an exact copy of the real thing, but who cares?



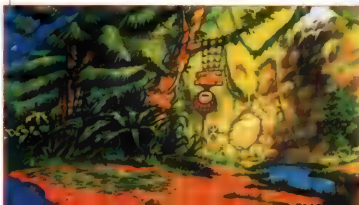
DIGITISED ILLUSTRATIONS

Famous French illustrator Segur was commissioned by Coktel Vision to provide the strikingly colourful exteriors for the third and final instalment of the *Lost in Time* adventure. Video footage of the actors has been superimposed over the illustrations, reminding me of ITV's *Knightmare* in places

Makandal's cabin has undergone a few digital cosmetic changes, but the chair is still present. The shattered window has been changed, but the digitised picture retains the dusty atmosphere of the original illustration



The waterfall location has lost some detail in its translation, but the vibrant green bushes still show their brilliance. The boy hiding in the bushes and the animated waterfall were added by the programmers during post-production

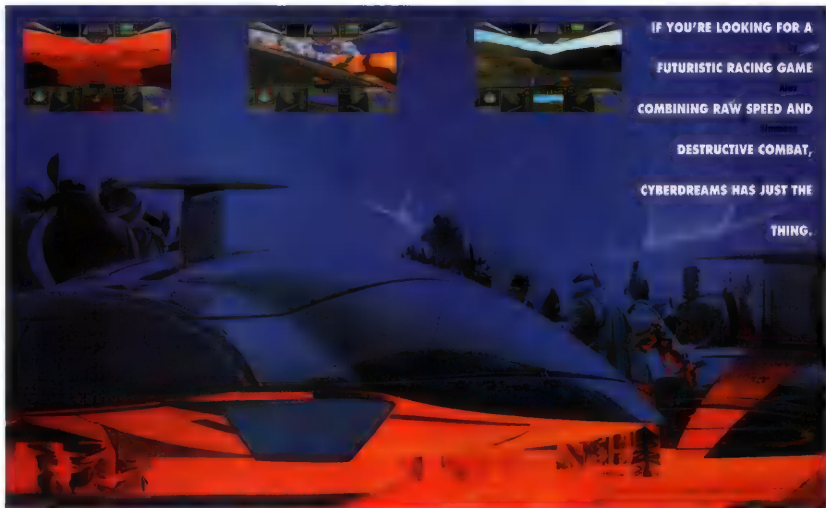


More Segur illustrations from the game. They exude brightness and sunlight, don't you agree?

REV
IEW

CYBER RACE

PAGE 52



IF YOU'RE LOOKING FOR A
FUTURISTIC RACING GAME
AND
COMBINING RAW SPEED AND
DESTRUCTIVE COMBAT,
CYBERDREAMS HAS JUST THE
THING.

PRODUCT

CyberRace

SOFTWARE HOUSE

Cyberdreams

PRICE

£44.99

REQUIREMENTS

Dos 5.0 Min., 4Mb Ram, 25Mb HD, 256 VGA, 20Mb Hard Disk

SUPPORTS

Joystick, Thrustmaster, Soundblaster, Adlib sound cards

CyberRace takes up a lot of hard disk space, but that's hardly surprising considering the game uses voxel-based photorealistic graphics (similar to those seen in Maximum Overkill: Comanche) to create a 3D raceway.

After installing (which can take anywhere from 15 minutes to... gasp, an hour!), the game boots up with a typical intro. It's very Terminator-ish with mechanical ships flying low over a post-holocaust hell-hole, the ground erupting under intense laser-fire. After a lengthy conversation between the hero of the game, Clay Shaw, his sidekick and the token bad bloke (all in digitised speech), they come to the conclusion that Clay is going to get his girlfriend back, he'll have to win the CyberRace. Sounds a bit like a Beverly Hills 90210 script!

"THE RESULT IS CYBERACE, A FUTURISTIC RACING GAME WHICH NEATLY COMBINES RAW SPEED AND DESTRUCTIVE COMBAT IN A SINGLE PACKAGE"

Before you're strapped into the sled, a measly 2,000 credits can be spent on upgrades and weapons. The basic skimmer which you start with is OK for racing, but is unarmed. Dumb weapons like laser cannons are cheap and nasty, whereas guided missiles are expensive

and aren't 100 per cent effective. Shields vary in price depending on the protection given and speed boosters like hyperfuel are well worth shelling out the extra cash for.

However, the player shouldn't purely rely on weapons, because the emphasis is on racing rather than combat. To progress, races have to be won by skilful driving, not by unleashing a barrage of missiles (although blasting the other competitors is a much better laugh). Weapons may make your path to victory slightly easier, but it's not very sportsman-like, is it?

A visit to the bar can reveal a wealth of information, but at a price. The girl propped against the bar simply advises on racing techniques; the alien sipping cocktails can 'fix' an opponent's car so

IN the past Cyberdreams teamed up with HR Giger, the surrealist designer of Alien, for the award-winning science fiction adventure, Darkseed. It has now joined up with yet another creative legend in the form of Syd Mead, the 'visual futurist' of Blade Runner. Cyberdreams and Mead have opted for producing something faster, something that gets the adrenaline flowing and the heart thumping. The result is of this collaboration is CyberRace, a futuristic racing game which neatly combines raw speed and destructive combat in a single package.

**REV
IEW**

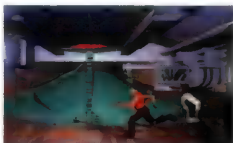
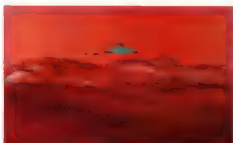
The lasers are 'dumb' weapons, meaning they don't home in on the target – the cross-hairs must be lined up on the enemy sled before opening fire



So far all is going well. Customising the sled was easy enough and chatting to the four bods in the bar was all very pleasant, so now it's on with the race. Without so much as a 3-2-1-Go!, all the other sleds zoom off, leaving you behind in a cloud of dust. It's about now that you'll find time to marvel at the exotic voxel landscape which is, in high-detail mode, particularly impressive. There's only one small problem though – with this much detail the game hardly moves. Even on a fast 486, CyberRace judders along and hardly recreates the feeling of speeds of over 300mph. On the other hand, I found the low-res mode too fast and therefore uncontrollable.

The graphics are extremely pixelly too, so I found the middle setting to be the easiest as it provided the best balance between detail and speed. However, this is only true on a 486, the

autopilot and what exactly is going on with the continually changing story-line. I think Cyberdreams has perhaps gone a bit overboard with the game's script. I agree that it does add another dimension to the game, but it would hardly be viable as a story on its own. There are the various aspects of



Don't think you'll be in a superior position if you hire saboteurs to rip apart the other sleds. They will do the same to you unless you can stop them in time



There are various camera views in CyberRace, which show the angles from different views or simply allow you to fly out-of-cockpit

"AS RACING IS THE MOST IMPORTANT ASPECT OF CYBERRACE, IT REALLY SHOULD GRAB THE PILOT IN AN ADRENALINE-PUMPING FIGHT FOR THE FINISH LINE. UNFORTUNATELY, IT DOESN'T"

lesser 386 is an entirely different matter. Even on low detail on a 386 it was slow, without a feel for speed which is surely what CyberRace is all about. I didn't particularly like the way the sled 'felt' either, jerking from one side to the other even if the joystick was caressed slightly.

The course is mapped out by brightly-coloured markers which stretch across the landscape. A radar at the top of the screen details other ships in the vicinity and the small screen at the bottom of the cockpit is a rear-view mirror which is vital for avoiding incoming missiles. Pushing forward on the stick accelerates your vehicle, and the two buttons target an opposing sled and open fire. Various keyboard controls cycle through the weapons and camera angles, but maintaining control of the ship with one hand and operating the sled's systems with the other takes a little practice.

The first lap is always chaos – each sled blasts the other to get ahead of the field, and with missiles being fired from all directions the ship is always spinning out of control. Fortunately, within a couple of circuits the field thins out and it's easier to keep the damn sled heading in a straight line. The race lasts for 10 laps or until the first sled crosses the line. The results are then worked out and the cash totalled up.

Afterwards the team retire to the bar once again, to watch the latest news and barter with the locals. Watch the news carefully as this will often reveal the next step forward, detailing new technological breakthroughs like the

sabotage, gambling and haggling but I'm afraid that's about your lot. Considering it's scripted by professional movie writers it's hardly the basis of a blockbuster film, is it?

As racing is the most important aspect of CyberRace, it really should grab the pilot in an adrenaline-pumping fight for the finish line. Unfortunately, it doesn't. This is mainly because of the control system which I mentioned earlier, but also because of the speed at which the game runs. A fast PC is needed, with a decent 486 DX really being the bare minimum – anything less and the sleds will jerk around the course.

Syd Mead has thought up some superb concepts and CyberRace is one of them. It's a shame that his vision of futuristic hovercraft meets formula one didn't become a reality. **SCORE ★★★**

SYD MEAD VISUAL FUTURIST

CyberRace is the brainchild of the Blade Runner set designer, Syd Mead. Several years ago, Mead had a vision of a futuristic race in which sleds skimmed along an interweaving multiplex of raceways at speeds in excess of 300mph. "Raw speed is certainly a very thrilling concept. Combine it with combat and a futuristic scenario, and what you produce is quite an experience", said Mead.

Most of the artistic elements of CyberRace are Syd's ideas, but the game wasn't actually born until the idea of futuristic racing was tied in with an original feature film script written by John Hegerman and Eric Enthro. Their script was created in such a way that it meant that CyberRace had literally hundreds of variable outcomes, depending on the player's ability to win or lose the next race.

Mead has also designed sets on other major motion pictures including Aliens, for which he created the exterior of the Sulaco and the armoured troop carrier that was carried by the drop-ship. The rocket ship Leonov in 2010: The Odyssey Continues was also one of Mead's creations.

He has won eight awards for his designs and has also dabbled in the design of theme park rides.



**REV
JEW**

FLIGHT SIMULATOR 5.0

FOR A LONG TIME THE DISCERNING PC OWNER

HAS FOUND SPACE ON THEIR HARD DRIVE FOR

MICROSOFT'S FLIGHT SIM. TIMES ARE A

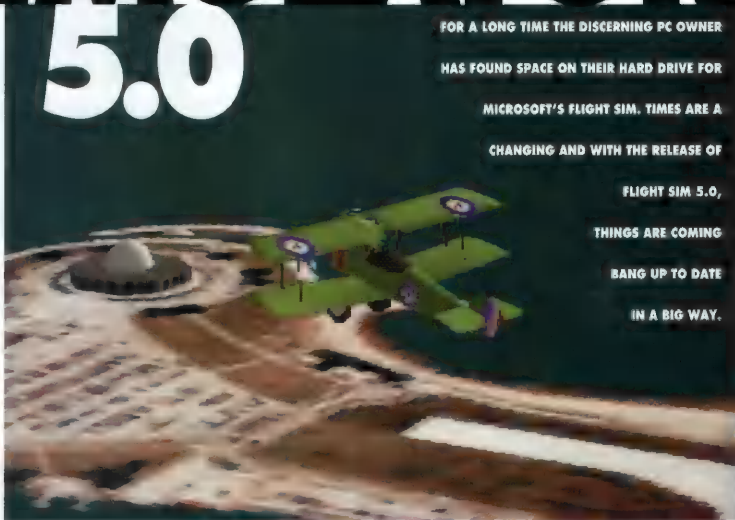
CHANGING AND WITH THE RELEASE OF

FLIGHT SIM 5.0,

THINGS ARE COMING

BANG UP TO DATE

IN A BIG WAY.



In the early days of the PC, Microsoft released what was to become a standard for a whole genre. This was a flight game that relied heavily on the realism aspects of flying and landing a light aircraft. The name of this game was Microsoft's Flight Simulator.

At the time it was released, there were no 'Strike Commanders and no 'Commanches' around. In fact, even

then Microsoft's Flight Simulator (FS) was the answer.

Now, in 1993 and after many upgrades, Flight Simulator version 5.0 (FS5) has appeared and, taking into account all that modern computing has to offer, it's attempting to enhance the flight experience even further.

The computing features that have now become the standard are a long way removed from the early days. Gone

"GONE ARE CGA AND HERCULES REPRESENTATIONS OF THE WORLD IN WHICH YOU'RE FLYING - THESE HAVE BEEN REPLACED BY SPECTACULAR 256 COLOUR VGA AND SVGA GRAPHICS"

though the outside graphics were phenomenally simple, single-coloured shapes, it was still considered a classic because of its adhesion to the real rules of flying. If you wanted to get as close to piloting a plane as possible, but without the obvious economical drawbacks,

are CGA and Hercules representations of the world in which you're flying - these have been replaced by spectacular 256 colour VGA and SVGA graphics. The humble PC speaker now takes a back seat while soundboards with multiple voices and digital quality

PRODUCT

Flight Simulator 5.0

SOFTWARE HOUSE

Microsoft

PRICE

£39.99

REQUIREMENTS

Dos 3.2, 386 or higher, EGA/VGA, 500K RAM with 256K extended, 10Mb Hard Drive

SUPPORTS

Mouse, Joystick/Flight Control Yoke, Soundblaster, Adlib, Roland Sound Cards

**REV
IEW**

As in all the preceding flight sims, there are a plethora of flying situations that you can choose to test your flying skills on. One one is called, quite unsurprisingly, 'hunt the hot air balloon'. As you can see, the task is not too difficult, especially seeing as you start off directly behind it anyway!



sound, alert you to what's going on in your make-believe world. All that, plus the fact that computers themselves have become infinitely more powerful than anyone could have imagined 10 years ago, have combined to make FS5 something much more remarkable than any of its predecessors.

The one thing that could be described as strange about flight sims is that there is no real aim to them. You don't have any goals to complete, no targets to bomb and no enemies trying to shoot at you. It's simply a case of flying, of using everything you learn in the early stages to go on longer and more intricate journeys, and of testing your skill against sudden unexpected problems. Flight Sim 5.0 gives you the chance to explore any part of this digital world with the confidence that, should

coloured polygons. In FS5 however, there has been a vast improvement. Gone are the simple line representations, and in comes something a whole lot more solid.

To start with, the cockpit graphics found inside the plane have been digitised from a real aircraft. All the controls are there, including dual VOR (very high frequency omnidirectional range) tracking devices and DME (distance measuring equipment) read-outs, helping to form the illusion that you're sitting in an aircraft on a runway.

You take control of one of four planes - a Cessna light aircraft, a Learjet, a WWII Sopwith Camel and an unpowered glider. It's easy to become completely overwhelmed by the complex-looking dials and read-outs found in the Cessna and the jet,

"TAKING OFF AND FLYING TOWARDS THE CITY REVEALS THE BUILDINGS IN THE DOWNTOWN AREA TO BE SOLID, TEXTURED OBJECTS"

you not make the runway before you run out of fuel, you will be able to get up in the morning and have another go.

The major selling point of a flight simulator nowadays is how it looks. It doesn't seem to matter whether there is a good game or an exceptional flight model there, as long as some sort of fancy shading has been used. In all previous FS games, graphics have been depicted by a relatively small part, being depicted by only the simplest lines and

especially if you're used to playing one of the earlier versions. The thing to remember is that the changes are purely aesthetic, and there has been nothing added to the panel. This is very useful for those who are coming to FS5 from one of the earlier versions, but not much help for someone who has never flown a simulated Cessna before.

The aircraft have also changed beyond recognition. Where they used to be rendered in simple, one-coloured

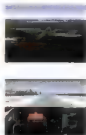


After having just left Meigs airfield, the time is now right to sit back and admire the many views that FS5 has to offer. The amount of detail on the plane can be scaled down according to what speed of computer you've got, but if you can get away with it, then go for the full effect. It's stunning

polygons, there is now the choice of having them displayed as either relatively simple bit-mapped images or, if the speed of your computer can manage it, a fully rendered aircraft complete with tail and fuselage markings. It's an option that is not going to make an awful lot of difference to the flight, but it fits in with the whole feel of the game, ie graphical excellence.

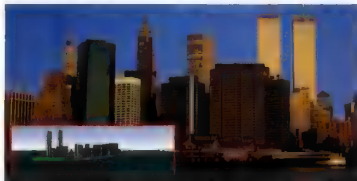
After making a choice of which plane to fly, it's time to explore the flight simulator world. The standard take-off point is in Chicago, although this can be changed from the comprehensive menu system. Taking off and flying towards the city reveals the buildings in the downtown area to be solid, textured objects as opposed to shapes placed on the ground to give the illusion of depth.

Any amount of detail is available on the buildings and the ground, depending on the speed of the computer that's being used to run the game. This detail can range from simple blocks with no pretty facade, to the complex, textured skyscrapers that increase the realism, but ultimately slow down the sim. ➤



JUST HOW REAL IS REAL?

Flight Sim makes a very big deal about having accurately depicted cityscapes and geographical locations, but just how accurate are they? Unless you had actually been to any of the places depicted, you wouldn't know whether they had stuck the odd building here or taken away the skyscraper from over there. To test out the water, so to speak, I took a couple of locations out of the game, the Manhattan skyline and the Golden Gate Bridge, and compared them to photographs taken of the relevant locations. Of course, you couldn't hope to get every last bit of detail into a computerised city, and to match the exact angle of the photographs would be very difficult indeed, but there should be certain similarities between the two to draw some kind of conclusion.



(Top left) So here I am, flying into New York, approaching the city from the north. The first things that you'll notice are the Twin Towers of the World Trade Centre, dominating the skyline. In the game, they are placed further back from the water than they should be, and some of the surrounding buildings have also been lost in the transition from real life to the computer screen, but other than that it's a very good attempt at cramming lots of square miles into a small amount of hard disk space. The Brooklyn Bridge, on the other hand, contains the absolute bare minimum of detail.

(Bottom left) The Golden Gate Bridge itself is as accurate as a bridge could be (after all, it's not the most difficult object to render as a computer), but there is no sign of the city until you get deep into the mainland. It's a shame because it would have been a lot of fun to fly through the bridge and do a couple of circuits of the city at low level. Still, in a few years, and after the release of FS6, things might be different. Are you listening, Microsoft?

REVIEWS

One of the most important landmarks in the United States is undoubtedly the Statue of Liberty. It symbolises freedom and a new way of life for millions of people. This historic landmark features in FSS, but there's something not quite right about it. From the front, she looks OK, if a little less detailed than she does in real life. The problems start to arise when you fly around to the side where you see that instead of being a solidly built statue, she is in fact as flat as board. If that's not enough for you, there is even a stage brace holding the poor girl up. Flight Sim 5.0 may be as close to the real thing as you could get, but as far as Liberty is concerned, forget it!



As you would expect from the company that brought the world of Windows in the PC, FSS allows multiple windows to be open. This allows you to configure them so that in one you could have an outside view of your plane from the spotter aircraft, in a second a view from the control tower, plus a map of the surrounding area in the third.



Among the new international situations that can be found in FSS, there are a number that take in some of the more scenic parts of France, including a flight around the Eiffel Tower.



► The ground also features texture mapping, thus giving you the impression of flying over something that is real, not flat and lifeless. Again, the detail on this is also variable, but the simplest representation is nothing more than a flat, green mass which forces the realism mark right down, but speeds up the game no end.

As far as Chicago goes, everything that distinguishes it from all the other cities in the USA is recreated here, including such landmarks as the John Hancock Building, the Sears Tower and the Chicago Bears' stadium. There's even the giant Prudential office block situated smack-bang in the centre of town, complete with the giant neon display at the top shouting out 'Prudential'. Do I detect a little bit of advertising here?

Dropping out of the sky at an alarming rate, all for the sake of a quick glimpse of the Chicago Bears. I had hoped that there might be some little animated players running about, but unfortunately not.



If you look at the Sopwith from one of the outside views and zoom in close enough, you'll find that the cockpit panel that is displayed at the bottom of the main window is accurately mirrored in the cockpit of the Sopwith.



As good as things look in the daylight, flying across a city in the dark is something else, and it's a very easy situation to set up during flight. Select 'World' from the six main headings in the menu bar at the top of the screen.

"TO START OFF WITH, THERE'S THE CHOICE OF MORE THAN 100 DIFFERENT AIRPORTS SET OVER SEVEN REAL-WORLD REGIONS, INCLUDING LOS ANGELES, MUNICH, PARIS AND NEW YORK"

and a selection of sub-menus will appear, including the time of day. Simply alter the time that you wish to fly, and the change takes place as soon as you get back into the game. The ground below is now alive with lights, and all the buildings omit an ominous glow. It's a lovely effect, and one which has been greatly improved over earlier versions.

Flight Sim 5.0 offers the player a

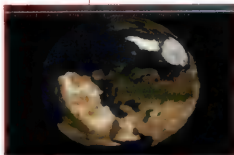
very accurate real-life environment to fly in. To start off with, there's the choice of more than 100 different airports set over seven real-world regions, including Los Angeles, Munich, Paris and New York. All these areas have been based

around actual sectional maps that real pilots use to plan flights, and so should be accurate enough to navigate using only VFR (visual flight rules), although it's not advisable. There are also numerous other options available that allow you to narrow down the flying experience into something that is more than just navigation and standard procedures.

**REV
IEW**

THE WIND OF CHANGE IS BLOWING

Unlike the map that was available in version 4.0, the new FS5 map lets you pull out far enough to see the whole world, as opposed to just the continent that you are currently flying over. Of course, there are varying degrees of magnification that allow you to see your more local surroundings.



The first, and possibly most useful, features that FS5 incorporates are numerous flying lessons that are designed to give the complete beginner the knowledge they need to take-off and fly simple exercises around a small, pre-defined area. For anyone who doesn't know anything about how or why an aircraft flies, these are very helpful.

The first lessons cover the basics, namely how to get off the ground, use the flaps and the throttle, and gradually progress onto things such as co-ordinated turns, recovery from stalls and aerobatics, although this does come much later in the course.

Lessons are something most flight sims fail to include, at least not practical, hands-on affairs. The combat sims tend to go for text book examples contained in the manual and, while these give some idea of how things should work, there is no substitute for getting up there and finding out for yourself.

Another thing that a lot of the modern combat simulators now incorporate is the facility to go head-to-head with another player via a modem or a null cable. Well, FS5 also offers this option, albeit without the combat. Here, a two-player experience is nothing more than flying around with the ability to talk to your friend (via the keyboard) and go sightseeing together, perhaps while dodging around a few of the taller skyscrapers the USA is renowned for.

Coupled with this scenario are others that allow you to try your hand at spraying crops, presumably somewhere in the Midwest, and indulge in a spot of formation flying with a computer-controlled guide.

Flight Sim 4.0 (below, right column) appeared in 1989. Flight Sim 5.0 (below, left column) has just poked its head out of the sand, and is still being appraised. So there have been four years between the two games, but how much has actually changed? On the face of it, not an awful lot. Both contain much the same elements that make up an accurate and enjoyable flight simulator, and both have the same level of realism that flight sim fans crave. The major difference between the two is in the way that they are presented. Graphically, the two are worlds apart. Whereas FS4 uses something very simple to portray the world, FS5 throws in just about every trick in the book, including fancy shading techniques, bit-mapped images and enough detail to make you cry.



The most radical and alarming change has taken place in the cockpits. Where there once were simple dials and gauges, neatly presented on a black background, we now get an actual digitised Cessna, Learjet or glider panel, complete with all the trappings. At first glance this is very off-putting, but after a little acclimatization it's as easy to read as that in number four. Personally, I prefer the more simple approach, but each is their own!

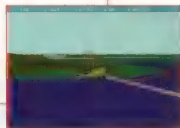
One of the strong features of the original was the detail that the night landings incorporated. All the landing lights and approach lights were there, and although they were very simple, it all worked. Surprisingly, there has been little change between the two versions. The lights are still there, but in version 5.0 the runways are actually 'solid' as opposed to vectors.



Coming into Chicago on version 4.0, you may notice a distinct lack of buildings. Sure, the Hancock Building and the Sears Tower are there, but I always thought that Chicago was a sprawling metropolis. Where are the other tower blocks and skyscrapers that American cities have become renowned for? Take a look at the city representation in v5.0, and everything is rectified. There are more buildings than you could shake a stick at, including some of the more obscure and non-famous ones, such as the McCormick Centre and the Prudential Insurance offices. This is what a computerised city should look like.



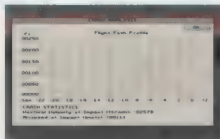
The bit-mapped planes that feature in FS5 are a vast improvement over the simple shapes that were on display in the earlier versions. Every last bit of detail has been crammed into them, so giving a real shot in the arm to the 'realism' statements.



REVIEWS



Believe it or not, those large, almost phallic things that you can see in the background are actually storm clouds. I'll bet that even Dorothy in the Wizard of Oz never had to contend with anything remotely like these



The flight path profile can be used to analyse where you went wrong during your flight. I'd hazard a guess that my problem was that I forgot the ground can't be flown through!

► Flight simulators of recent years have been inundated with outside views offering every perspective. A reverse tactical view, enemy engagement view and warhead view are just a couple of the more extreme ones that have surfaced recently, and just because FS5 doesn't feature anything as technically advanced as the latest smart weaponry, it still has some good external views. It even boasts something that no other simulator has – multiple views at the same time. Let me explain how it works...

When you are flying around the flight sim world, the main viewing window will be the one that you'll be concentrating on because it contains the view of the outside world that

displayed along with a map. Also, any of the 3D views can be rotated around the aircraft, thus giving you almost complete freedom over how you want to see the aircraft. This is a novel approach to a simple and sometimes misused feature of flight sims, although it would probably be of limited use in a combat sim in the heat of battle. After all, the screen gets cluttered enough as it is.

For all the great graphical touches that are displayed throughout the game (and believe me, there are a lot), for all the unique flying situations that you can find yourself in, and for all the different scenery and airports contained in the flight sim world, unfortunately there are a few things that let Flight Simulator version 5.0 down when it comes to how

"ANOTHER PROBLEM IS WITH THE GRAPHICS. PRETTY THEY MAY BE, BUT FUNCTIONALITY THEY MOST DEFINITELY ARE NOT. EVERYTHING MOVES VERY JERKILY, AND THE FEELING OF FLIGHT IS LOST..."

pertains to the area you're flying over. Available within this window are three other views: one from the tower, a spot view and a track view (only available when flying with another player). Normally, only one of these would be available at any one time (after all, there is only one window), but in FS5 by making another window active, you can have either of the other three views

well it plays.

The first, and without doubt the most infuriating, fault with the program is the amount of disk access that the game does during the flight. Imagine this scenario: there you are, flying away from Meigs airfield and turning onto a course that is going to take you straight into downtown Chicago. Everything seems fine, the landing gear is up and

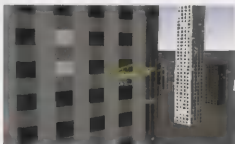
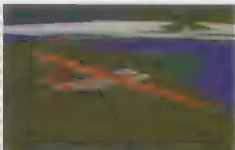
you're cruising at a nice speed. Chicago approaches, when what should you hear but the "chug, chug, chug" of the hard drive as it accesses the scenery! There really is no excuse for this, especially not on a machine with ample amounts of memory (I tested it on a 486 with 8 meg).

Another problem is with the graphics. Pretty they may be, but functional they most definitely are not. Everything moves very jerkily, and the feeling of flight is lost because the turn rate of the aircraft is so pitifully slow. A flight sim needs smooth graphics to convey an airborne feeling because short of multi-million pound hydraulics, there's no other way that we're going to experience it.

The final problem with the game is that it is just too similar to Flight Simulator v4.0 to really warrant attention from the people who already own that. There are pitifully few new flying scenarios in it, no new planes and only a couple of new real-world areas to fly in. The inclusion of the superb graphics do go some way to making up that shortfall, but in the long run I'm not sure whether there's going to be enough in this new, updated package to convince all owners of Flight Sim 4.0 that this is the definitive purists' flight simulator.

SCORE ★★★

As I've said elsewhere in this review, the changes made to the new version are very minor. Most of the situations that were present in version 4.0 are represented here, including things like gliding over the Golden Gate Bridge and crop spraying



Looking down on the Learjet, it's easy to see why the term photo-realistic is applied to FS5. This shot was taken when the game was being displayed in VGA, although there is also the option to have it in SVGA. This just sharpens up the image rather than altering the graphics drastically



BRACE

**REV
IEW**

EXPERT OPINION

"THE first thing I would say about FS4 is that the aircraft model is way too agile for a Cessna. Flying it reminds me of my days as a fighter pilot.

The cockpit looks fairly good though – everything is here that needs to be here. The heading indicator is off-putting though because it's digital. When you are flying a plane, it's important to see where you are going, and you would normally do this by looking at the heading indicator. It gives you a very clear idea of what direction you are heading in, and because it's

the yoke back, there is no response for a couple of seconds and then you feel the movement. When I perform the same manoeuvres in this one, the response is immediate.

The cockpit panel in FS5 is very good indeed. In fact, it's very similar to the ones that are found on the simulators here at CES Aviation. The heading indicator has also been vastly improved. Everything that was wrong with the instruments in version 4.0 has been put right, with the result being that it's very easy to read, and it looks like a closer representation of the real thing.

"THERE'S ALSO NO INERTIA IN THE FLIGHT MODEL. IN A REAL AIRCRAFT, WHEN YOU PULL THE YOKE BACK, THERE IS NO RESPONSE FOR A COUPLE OF SECONDS AND THEN YOU FEEL THE MOVEMENT"

graphically depicted, you don't have to study it long and hard. With a digital readout things are very hard to see, and too much time is taken up with reading the thing.

There's also no inertia in the flight model. In a real aircraft, when you pull

Again, the flight model of this plane appears to be far too agile. In fact, I'd go so far as to say that the roll rate of the simulated Cessna is not unlike the roll rate experienced in a military jet.

The first thing that I would test with a Learjet is the autopilot. When you are



Brian Todd, the gentleman pictured above, works as a flight simulator instructor at CES Aviation. As an ex-RAF pilot, he is more than qualified to offer constructive criticism on the latest civilian flight sim, FS5

flying something as advanced as this, the pilot actually has very little to do. After take-off just switch on the autopilot and let the computers do the work for you. It seems to be able to hold the heading and altitude very well, but to change either you must enter into one of the menus and alter it from there. I would like to have seen a system whereby the heading and speed were displayed at the top of the screen, and to change them you simply clicked on them with a mouse and altered them while you were still flying."

THE REAL THING

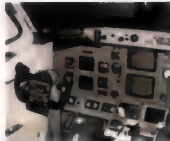
At CES Aviation there are numerous simulators used to train pilots in. These range from the relatively simple Frasca Warrior trainers which feature no graphical representation of the outside world, to the large, hydraulically actuated 737 LOFT trainers that simulate all the systems of a Boeing 737 commercial airliner.

If you hadn't seen a commercial simulator you'd

probably think that they all had state-of-the-art graphics that could place you anywhere in the world. Well, you couldn't be more wrong!

Brian Todd: "The small, fixed-wing Warrior trainers feature no outside view, purely because they are used to train pilots in the art of IFR (instrument flight rules) flying. The pilot concentrates on using their instruments to navigate and fly the plane, with no help from the outside world. This is in effect 'real' flying, because most of the pilot's time when they are up in the air is spent on reading instruments and concentrating where they are going, as opposed to looking at the scenery below.

The visuals that are used here are nothing more than functional. When a pilot comes in to land their



aircraft, all that they are looking for are the 500 yards of runway. Nothing else is important. The things that we simulate here are a horizon, a small amount of textured ground to give the pilot some feeling of depth, some buildings when they are near an airfield and clouds that can be set through a variety of densities to simulate varying degrees of visibility. The sky in Flight Sim 5.0 is absolutely superb, as are the ground details. Graphically, FS5 on the PC is way ahead of anything that we are currently using here."

The 737 LOFT (line orientated flight training) simulator features a graphical representation of the outside world. These huge, hydraulic monsters contain everything found in the real aircraft, with the flight scenarios being controlled by a computer operated by an instructor from the back of the plane. Surprisingly, the viewing window is very small. Onto it is projected a very simple

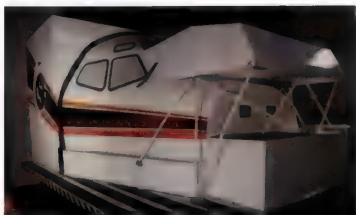


representation of the outside world, from which the pilots can glean some basic information necessary to the flight.

Brian: "As with the Learjet, most commercial aircraft are flown by the autopilot, with the controls only being taken over at the final moments of landing, and at the initial stages of take-off. The autopilot could land the aircraft, but the correct procedure is for the pilot to take over, and bring the plane down under human control."

Although very large and complicated machines the CSE 737 simulators cost comparatively little, only £1.5 million as opposed to a little over £12 million for the very same simulator with world-perfect graphics as used by BA at its pilot training school.

It's rather nice to know that the humble PC can produce something that will blow a multi-million dollar machine out of the water graphically, even if the feeling of flight isn't quite so real.



**REV
IEW**

PRODUCT

V For Victory...Gold-Juno-Sword

SOFTWARE HOUSE

Electronic Arts

PRICE

£39.99

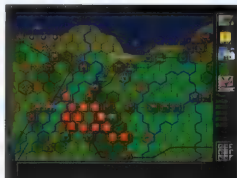
REQUIREMENTS

Dos 5.0, 2Mb RAM, 512k VGA, Mouse

SUPPORTS

Soundblaster, Adlib soundcards

The main menu with options to select scenarios, introduce 'what ifs' and play the other battlesets



The optional layout with hex squares and the use of classic military symbols

THE first V for Victory title from Three Sixty software was D-Day - Utah Beach. After a couple of campaigns in other theatres of WWII, the classy US software company now returns near to its original battleground in V for Victory IV...Gold-Juno-Sword. These were the code-names for the British and Commonwealth beaches during the 1944 Normandy Landings and this new battleset puts you in the position of either the Commonwealth or German commander.

War Two battles. Set at a strategic level, players assume the role of opposing commanders at a divisional/corps level, and although based on classic board war-gaming design, the V4V staff assistant takes overall control of all the number crunching and can be delegated virtually all the general game mechanics. This lets the armchair strategist sit back, consider the battlefield information and make command decisions at various levels of detail and complexity.

Gold-Juno-Sword (GJS) has the same superb graphics as the earlier V4V titles, and these without a doubt are among the best-looking war games

a unit, drag it to its destination and the staff assistant does the rest. It resolves combat, zones of control, attrition and supply and takes away all the pain of referring to charts and statistics (and arguments about line of sight and remaining movement points).

Gameplay is divided into 'turns' where orders are given for movement, air combat patrols, artillery fire and naval

"GOLD-JUNO-SWORD. THESE WERE THE CODE-NAMES FOR THE BRITISH AND COMMONWEALTH BEACHES DURING THE 1944 NORMANDY LANDINGS"

For those not familiar with the V for Victory (V4V) titles, it is a series of graphically stunning and extremely playable strategy games featuring World

about. The interface is also very simple to use, with drop-down menus and all the commands being given by a mouse point-click-and-drag system - just select

V FOR VICTORY GOLD-JUNO-SWORD

THE V FOR
by
VICTORY
Robin
SERIES
Matthews
GROWS AS
THREE SIXTY
REASSERTS
ITSELF AS
A GREAT
DEVELOPER
OF STRATEGY
SIMS.



REV
IEW

ORNE SCENARIO

The cream of the British 6th Airborne Division, Royal Marines and Commandos have landed in occupied France. Operation Overlord is 24 hours old and these units are attempting to take and hold the bridge at Orne and consolidate their beachhead.

The 1st, 2nd and 3rd Battalions of the 9th Regiment of the 3rd British (London) Infantry Division are SW of the Orne bridges, the 6th Airborne is poised between the bridges and the town of Breville.

The Germans are recovering from the initial

shock of the invasion and the three Coastal Artillery Batteries form part of Hitler's much vaunted 'Fortress Europa' – these need urgent reinforcement. The 1st Battalion SAS has taken control of an important village to the east of Breville.

bombardments. Once all commands are given the staff assistant will attempt to carry out these orders and reconcile them with those of the other (computer) player and resolve all combats. This means that although movement and combat are strictly speaking 'turn-based', each side's orders and their effects are simultaneously calculated. This again avoids some of the false situations of alternate player moves.

After the calculations are put into effect each combat can then be viewed and its resolution and effects considered. There is a flexible save game routine that allows players to replay a particular turn and try to perfect the best tactics – a feature most real commanders would no doubt welcome! Moving to the next turn will introduce reinforcements and progress to the next stage of the battle.

At the highest level of involvement, the staff assistant will do pretty well everything other than move your units. All the aspects of supply, indirect fire control, air strikes, disruption and morale will be collated and their final effects applied. For those who really want to get immersed in the nitty-gritty, all these can be removed from the

SCOTT EVANS THREE SIXTY SOFTWARE

"To me, this gameset presents one of the biggest 'what ifs?' in this pivotal invasion. I believe that one is forced to examine the incredibly powerful German armour units arrayed against the Commonwealth forces and imagine what might have happened if better command and control had been exercised over them. I particularly wonder what might have transpired if the Axis command, through aerial reconnaissance assets had been able to garner a better overall intelligence picture of the unfolding battle. This factor alone may well have dictated an entirely different outcome for the battle. How will you as a player use it to your advantage?"

V FOR VICTORY I -

D-DAY, UTAH BEACH 1944

Take the role of the German or US Commander in operations to and around the main American landing beach.

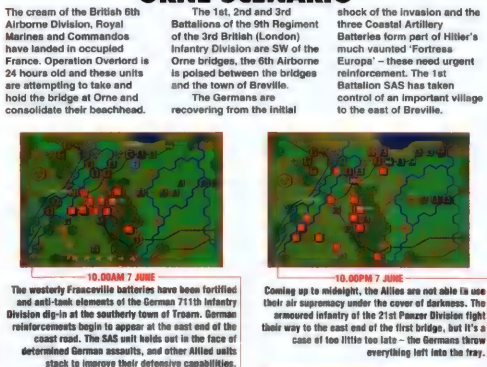
V FOR VICTORY II -

VELIKIYE LUKI 1942

The Russian Front, an ancient fortress town strategically situated on the all-important Vitebsk-Leningrad railway.

V FOR VICTORY III - ARNHEM 1944 - OPERATION MARKET GARDEN

Control the fight for the bridges, from Eindhoven through Holland to the campaign that was A Bridge Too Far.



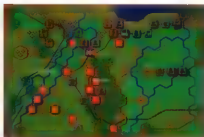
British Paras take the Allies into their furthest objective at Troarn. At Franceville, Allied Commandos engage in street-to-street fighting. The SAS continues its dogged defence in the meadows.



After heavy fighting, the German route to the Orne Bridges may be opening up – but at a terrible cost. The SAS continues to hold the Germans up and the 3rd Parachute Regiment has eliminated all enemy forces near Troarn. At this moment the Allies control all strategic objectives, but the Germans now possess every piece of field and coastal artillery, including the feared Nebelwerfer rocket launchers, against the Allied defenders in the south at Breville in an attempt to clear the flank for a dash to the bridges.



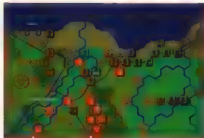
At the end of the last turn the German gamble fails. They are involved in an exchange of units south of Breville which they cannot afford, and to make matters worse Commandos rush to the fray at Franceville and even the SAS go on the offensive!



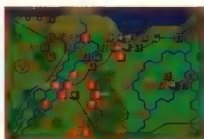
Coming up to midnight, the Allies are not able to use their air supremacy under the cover of darkness. The armoured infantry of the 21st Panzer Division fight their way to the east end of the first bridge, but it's a case of too little too late – the Germans throw everything left into the fray.



All maps and every piece of German equipment are sent towards the Orne bridges – the pressure of reinforcements creates 'over-stacking' messages and the Germans just can't get their new troops into the fray. The swamp and bocage either prohibit movement of armour or limit movement of other units.



The dawn of a new day, 8-day +2. The Germans desperately attack the Orne Bridges with overlord troops. The coastal road is now blocked, the SAS controls the other route through the swamp, but can the German armoured columns cut through all the way to the beaches?

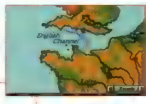
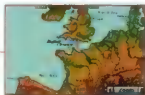
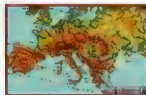


The Germans launch a series of last frantic attacks, but the Commandos and Airborne forces hold firm – and look at that SAS unit! The Germans are now in deep trouble as their only thrust is blunted at the bridge. A final fling at Franceville comes to little and the only chance the Germans have is queuing up the wings.



Decisive victory – the course of history is confirmed... this time!

REV
IEW



The geography of the theatre is wonderfully rendered in detailed SVGA graphics



► computer's control and administered by the player. At these more complex levels, different types of movement, attack and defence, plus weather, fatigue and supply can be incorporated to make GJS about as complicated as is comfortably manageable.

GJS consists of seven scenarios of varying length and difficulty, each of which can be played from either the German or Allied side. The Allied strategy underlying each scenario is to consolidate the beachhead and establish the foundation for establishing the Second Front. The German player must destroy the invaders and 'throw them back into the sea', à la Rommel.

The battlefield is the Bayeux-Caen area of France and features 13 different terrain types including swamp, beach, forest and the infamous bocage. Over 600 military units with troops from four countries including some of WWII's elite military formations – such as the British 1st, 8th and 30th Corps, the 7th and 11th Armoured Divisions, the German

2nd and 21st Panzer Divisions, the 1st, 2nd, 9th and 10th SS Panzer Divisions and Panzer Lehr are featured. GJS also introduces for the first time in V4V full

include the British 6th Airborne and German Nebelwerfer rocket units.

The scenarios take the players from an introductory skirmish over the Orne

"TRY OUT THE SCENARIOS WITH LUFTWAFFE PARITY AND PANZER DIVISIONS NEARER THE LANDING BEACHES - IT GETS VERY TOUGH FOR THE ALLIES"

Panzer Divisions and Canadian troops (the 3rd Infantry Division supported by the 29th Armoured Division). Unit types



The calendar keeps track of the campaign's progress throughout the month of June

Bridges, through several clashes around the 'crucible of Caen', a hypothetical German counter-attack to stop the link-up with Omaha beach, and the 'linking the smaller scenarios together 'what if?' option' that allows players to alter the historical facts by introducing variables that may have substantially affected the course and outcome of the battle. Air superiority can be altered to either increase or decrease virtual Allied air supremacy, as can the weather and arrival or deployment of German Panzer units. Try out the scenarios with Luftwaffe parity and Panzer Divisions nearer the landing beaches – it gets very tough for the Allies.

Each of the scenarios is sharply balanced and the players will end up playing them many times over to achieve a reasonable victory. The campaign game is a real monster and requires a high level of nerve that should tax the most seasoned wargamers.

GJS has several improvements and enhancements in the V for Victory games engine – supply handling, movement and combat resolution and the system's general artificial intelligence (AI). Previously, the AI of V4V games has been criticised for being too simple, but the computer opponent in GJS is now much tougher and a couple of the daft things like engineers disappearing after building a bridge have also been addressed. This is part of a continuing process of development that Three Sixty is pursuing, but it does cause compatibility problems with the earlier battlesets. Accordingly GJS includes complimentary data patches for the three previous game sets, and once patched the owners of the old game sets will also be able to take advantage of these latest improvements.

These upgrades can cause some confusion, but this desire to continually improve the product is typical of the way that Three Sixty approaches its software production and is to be applauded.

Great graphics, good interface, an excellent gaming engine and flexible levels of difficulty have made the V4V series one of the most successful war games around, with the improvements in Gold-Juno-Sword making it the best yet. With the forthcoming release of a US Civil War game using the V4V engine, Three Sixty looks like the true king of the computer battlefield. **SCORE ★★★★★**

EXPERT OPINION

IT has to be the incredible detail that has impressed me the most about Gold-Juno-Sword. You can not only play the campaign as it actually was (with all the parameters set by history), but you can also tinker around with it and change so many things, such as the weather, troop superiority and all the different levels of play. It's infinitely variable so the value for money you can get out of the game is going to be incredible.

The game is really designed for the expert but is not overly difficult to get into. The manual and quickstart sheet are very good, and if you've played war games before you'll get quite far with few problems.

If you're expecting loads of bells and whistles, you won't find them here – what you will get though is realism, and you can even alter the realism levels too if you so desire. The presentation is very clean, thus allowing decisions to be made with relative ease. The way you can move around within the game is very straightforward – you don't get stuck and there are no annoying delays.

The only criticism I have with V for Victory is that some of the instruction panels are a bit too small – there's some onscreen information relayed to the player that maybe some of the panels could have been a little bit larger.



Tim Matcalf has been a journalist for donkey's years and was at one time editor of C&VG (in the good old days when I reviewed proper games). He was also editor of role-playing mag, Gamesmaster

Of its kind, V for Victory IV is one of the best war games that I have seen and played for a long, long time. I think the V for Victory series will continue to be a success with this new release. It's an excellent product and anyone who is into war games in a serious way will get a lot from it."

**REV
IEW**

COMPETITION

EMERGE VICTORIOUS WITH ELECTRONIC ARTS

ATTENTION

all strategy fans and tacticians! Feast your eyes on the latest Three Sixty war game. In this, the premier issue of PC Player, we've taken a critical look at the latest and possibly the greatest V for Victory game, Gold-Juno-Sword. Now, in collaboration with the game's distributor Electronic Arts, we give five lucky people the chance to win the entire V for Victory series just by answering a simple question.

"THE CHANCE TO WIN THE ENTIRE V FOR VICTORY SERIES JUST BY ANSWERING A SIMPLE QUESTION AND COMPLETING A TIE-BREAKER"

The V for Victory games are all based on the second World War, ranging from the Russian front in November 1942 to the D-Day invasion of Utah Beach, June 7th, 1944. V for Victory covers virtually all aspects of World War II (without the bloodshed),

featuring several campaigns in each battleset and a user-friendly control system which makes the entire series remarkably easy to play.

The four battlesets, all of which are up for grabs, will place you in command

of entire Panzer tank divisions or in charge of ordering a team of German ski-brigadiers to attack a snow-covered fortress. The beauty of the game is the fact that you can fight the battle from one point of view then change sides to play the same scenario with the opposing army under your control.

So if you fancy laying your hands on over £150 of the latest war games, simply answer the following question and complete the accompanying tie-breaker in the most original and humorous way. For example, 'Hitler has only got one V for Victory game in his collection'. OK, here goes:

WHAT WERE GOLD-JUNO-SWORD?

**TIE-BREAKER
(COMPLETE IN LESS THAN 20 WORDS)
HITLER HAS ONLY GOT ONE...**

Scribble your answers down and send them to:

**V FOR VICTORY
COMPETITION**
PC Player,
16-17 Hollybush
Row,
Oxford,
OX1 1JH.



COMPETITION

The portcullis is raised. As the rattling chains come to rest, the bright light of the fiery red sun burns into your eyes. You hear the cheering crowd awaiting the entertainment – which today is YOU!



Shattered Lands is the first AD&D game to take full advantage of the isometric magic system. Palenics play an important part in the Dark Sun campaign setting



ATHAS the world of the Dark Sun, was once a green and prosperous land. Powerful mages travelling the land gained their power by draining the planet of its vitality – slowly sucking the land dry of all life and energy. This misuse of power caused the sun to transform from a pleasant yellow glow in the heavens to a raging red fireball wedged on the horizon. The seas evaporated leaving huge basins of silt, and a great proportion of the planet's surface covered in swirling, red sand.

Natural resources became intensely over-mined, rendering metal extremely rare and valuable. Water became scarce and the creatures of Athas mutated through free use of magic. New and increasingly frightening monsters emerged from the deep desert to plague the remnants of man.

The only stable concentrations of humanity are now to be found in sprawling city-states; large walled cities ruled by 1,000-year-old sorcerer-kings. These kings pronounced themselves gods, ruling the land through a religious organisation called the Templars. Their evil reign is harsh and violent and a high proportion of the population has been enslaved.

The few places with any freedom are the isolated villages founded by escaped slaves. Though free, life in the desert wastelands is dangerous and difficult. Water supplies are hard to come across and marauding monsters can devastate villages without warning. Make no mistake, Athas is an inhospitable place to exist. Until the sorcerer-kings are destroyed, no innocent inhabitant of this dry planet may look beyond a life of day-to-day survival.

PRODUCT
Dark Sun - Shattered Lands
SOFTWARE HOUSE
SSI
PRICE
£45.99
REQUIREMENTS
Dos 5.0 Min, 2Mb Ram, 25Mhz 386, 256 Kba, Mouse, 37Mb Hard Drive
SUPPORTS
Soundblaster, Adlib, Roland, ProAudio Spectrum Sound Cards

DARK SUN SHATTERED LANDS

When you eventually start to get somewhere, you'll notice that the quality of the graphics improves no end. This giant's armoury is just one example of the minute detail the graphic designers have gone into



**REV
IEW**



IF THE SHOE FITS, WEAR IT

SSI's newest AD&D release is a departure from its past games and is hailed as the beginning of a "new generation of AD&D RPGs". Based on the role-playing books of the same name, Dark Sun offers a new and improved game engine that confines all combat and conversation to just the one screen, eliminating the need for separate displays to be called up. This not only saves time, but also cuts down on annoying combat sequences.

You begin the game enslaved within the city-state of Dray — a densely populated capital city ruled by the sorcerer-king Teclutikilly. You are condemned to life as a gladiator; fighting mercilessly for your life inside the arena. The Templars watch your battles from the safety of the stalls and cheer when the blood runs over the dry soil of the arena floor. Life inside Dray is simple — either bow to the power of Teclutikilly or die as the day's entertainment. Surviving gladiators are thrown back into the slave pens to await

choose for your character, they are then eligible to belong to certain classes — a class being the equivalent of an occupation. Humans can be any class but other races are limited in their options — halflings, for example, cannot be preservers.

Your characters can be aligned to a certain philosophy — this may affect how certain non-player characters (NPCs) and magical items will react to your presence. The possibilities range from believing strongly in society and altruism (lawful good) to being anarchistic and actively unpleasant (chaotic evil). Unfortunately your party characters must be either good or neutral; they cannot be of evil alignment, which is not much fun is it? Hit points and ability scores must then be chosen before finally deciding on individual names for your warriors.

Dark Sun — Shattered Lands is almost entirely mouse driven. Moving the mouse around the screen highlights all the objects that can be interacted

automatically walk over and begin hand-to-hand combat.

The second pointer icon is a weapon attack icon represented by a sword if you're close by, or an arrow if you're too far away to make contact with your sword. The third pointer is the examine icon — simply highlight the character or object to be examined and a small box will deliver the relevant information.

If you examine a character, more often than not you will also be able to talk to them. If so, a diamond 'talk' icon appears inside the information box. Conversing with NPCs can be involving and fun because the conversation parser is comprehensive and humorous — on occasion, up to six different sentences are offered as alternatives. The examine icon can also be used to pick up and use certain useful objects in the game.

AD&D adventures are extremely combat oriented and Dark Sun is no exception. Conventional weapons, such as swords and axes are useful for close combat, but more experienced adventurers will prefer to use magic. Dark Sun offers the player a choice of — get this — 168 different spells! These are divided into three categories: preserver, psionics and cleric. They are then subdivided into three further categories: kinetic, metabolic and telepathic, which are then once again sub-divided into sciences and devotions! Casting is simple enough, just select your spell, then choose a target. Some spells can be contained within a certain area, so a range indicator is included to allow for fine tuning.

If you become lost within one of the 36 labyrinthine levels you can call up a map of the entire section to check exactly where you are. Alternatively, you can push the mouse pointer to the screen edges in order to survey your immediate surroundings.

"CONVENTIONAL WEAPONS, SUCH AS SWORDS AND AXES ARE USEFUL FOR CLOSE COMBAT, BUT MORE EXPERIENCED ADVENTURERS WILL PREFER TO USE MAGIC. DARK SUN OFFERS THE PLAYER A CHOICE OF - GET THIS - 168 DIFFERENT SPELLS!"

their next fight — who knows, maybe next time the battle won't go quite so well as you planned it?

Escape is the likeliest option. The only trouble is that the place is swarming with guards and hostile monsters, so this is definitely going to have to be a team operation. Before starting the game, you are required to create a new team of up to four characters. A default team is available for an immediate start, but RPG purists will obviously want to set up their own party.

Characters are divided into eight different races (human, elf, dwarf and so on) and depending on which race you

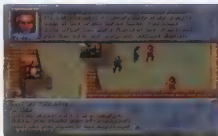
with — be they NPCs, places or objects. Usually the NPC can be indicated by a change of colour — grey characters are neutral, allies flash gold and enemies turn black.

The mouse pointer can be cycled through three different interactive modes by a simple right-click of the mouse button. The 'walk' pointer allows travel to a chosen point by simply clicking on the destination. If the path is blocked, or you try something stupid, such as trying to walk into a lava pit, the cursor changes to the 'can't walk' icon and you must reconsider your actions. Alternatively, if you click on an enemy character while in walk mode, you will

**REV
IEW**



Unorthodox maybe, but these full screen level maps are very handy. You can click anywhere on the map and examine the area more closely, even if you've yet to visit it



If you stay and fight in the arena you will eventually get to see every monster in the game. I'd try this one AFTER completing the game, not before!

► Since the series began in 1988 with Pools of Radiance, the AD&D environment has been outclassed in terms of both presentation and depth by titles such as the Ultima series, and has never even come close to regaining its foothold within the genre.

Even with this new game engine Dark Sun looks very untidy, especially the ill-formed sprites waddling around

slowdown also affects cursor control quite badly – the pointer sometimes stops dead while the program updates the scrolling screen and I found this incredibly frustrating at times.

The inclusion of all those spells may look great on paper, but it just doesn't do anything for me. I doubt if it does the game much good either – why bother to clog the program with this amount of

programmers had a sense of humour and this just about pulls the game's flimsy plot from the void. The relative simplicity of the game allows a fair rate of progress, which in turn tends to entwine the player into the scenario. I doubt if Dark Sun will cause many problems for experienced RPG players.

The biggest problem with AD&D games in general is that the series is far too combat reliant, and Dark Sun is no exception. Players are expected to wander around fighting monster after monster with no real task in mind. If you become involved in a sub-quest, it's usually quite a superficial task involving little object manipulation or thought. In fact, if you're that way inclined, then go through the entire game killing everything encountered – sure, it'll mean missing out on most of what the game has to offer, but it's an option that has obviously been included by design and not by accident. I suppose it's the price you pay for simplification of gameplay.

SCORE ★★

"THE BIGGEST PROBLEM WITH AD&D GAMES IN GENERAL IS THAT THE SERIES IS FAR TOO COMBAT RELIANT, AND DARK SUN IS NO EXCEPTION"

the scrolling landscape. Actually, 'scrolling' is too kind a word to use on Dark Sun because the screen update is SO slow it's unreal. The juddery scrolling affects play and is highly detrimental to the presentation as a whole. There are toggle options to speed the game up slightly, say by turning the character animation off, but the effect is negligible and the unanimated sprites look stupid. The

spells when you could spend some time improving the presentation or something? I know most serious role-playing enthusiasts like their games detailed, but this is just taking the piss and is a huge overindulgence on the part of the designers.

Despite what you may think, I did enjoy parts of Dark Sun. If you restrain your killing sprees, there are plenty of interesting characters to talk to – the

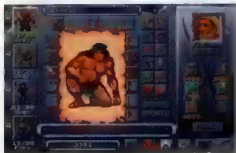
"Ooh, I should know if I should go in there! It looks kinda scary. Maybe I should just wait here a while? But if I stay, who will stop Tachikitty and his armies? Aw, shit. Here goes..."



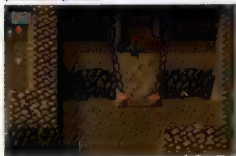
The Dark Sun bestiary has been upgraded with all the new monsters and enemies featured in the TSR Dark Sun campaign setting

If you're looking for killing sprites then this is the game for you. This may result in a rather truncated version of the game, but that's the price you pay

Trust no one, especially seemingly friendly Templars. They may offer you the world and betray you when you least expect it



Hopefully, subsequent additions to the Dark Sun campaign setting will iron-out the niggling presentation problems



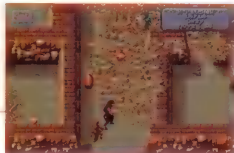
**REV
IEW**

THE ABC
OF
SPELL
CASTING

Lining up for the Entangle spell. The grey box over the targeted character will be the epicentre of the blast, and the grey spheres are range indicators

Having triggered the spell, a flash of purple light bathes the dungeons with an ethereal glow. Stand well back and wait for the spell to take full effect

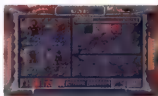
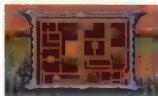
The fully fledged entangle spell covers the room with a mat of spiked vines. Anyone foolish enough to walk into the thorned carpet will obviously pay the price!



Some spells are quite spectacular in effect, take this Flaming Sphere for example – first you must line up a correct trajectory before choosing an effective range, hopefully taking out as many monsters as possible!



Enter into conversation with the game's more colourful characters. The wrong reply may end in violence – just like in real life...



HOW WAS IT FOR YOU DAVE?

"IN role playing, when new Dark Sun adventures rear their heads there's usually a mad dash for the door – to get away from them basically! There have been one or two good Dark Sun products and the campaign setting itself is a damn good idea – it brought a lot of new features into the AD&D games. As far as the computer game goes if you're a Dark Sun player then you'll love it, but if you're an AD&D player then it'll be like a new system to you – there's a lot of things in there that you don't get in a bog-standard AD&D game.

As far as the 'new, improved' game engine goes; personally I prefer the first-person perspective games. Dark Sun is a bit of a throwback to what TSR was doing before Eye of the Beholder, a bit like Legend of the Azure Bonds. When I first started playing Azure Bonds I didn't really enjoy it because of the way it was presented, but once you get into it though, it's OK. I still thinkSSI should have stuck with the first-person perspective engine.

The combat system isn't too well thought out – it's more a case of just running in and hitting things rather than thinking about what you're going to do. The game is not very user-friendly, there are too many menus and icons to scroll through which take some getting used to, and when you're actually into

get. A lot of other games will give you a selection of, say, about 12 different spells at the most, which can be a bit of a pain to say the least. The psionic system is a nice inclusion too, because mental power's quite an important part of the Dark Sun world.

I was quite impressed with the role-

"THE COMBAT SYSTEM ISN'T TOO WELL THOUGHT OUT - IT'S MORE A CASE OF JUST RUNNING IN HITTING THINGS RATHER THAN THINKING ABOUT WHAT YOU'RE GOING TO DO"

the gameplay you don't want to be messing about with a huge amount of menus.

Spell-wise, considering that there are literally thousands in the AD&D world, 168 isn't that many, but it's more than most games have had in the past and it's probably a fair representation of what you've got in the game system itself. Dark Sun is aimed at AD&D players on the whole, so most of them are going to know the spells already and it also means that you've got a bit more to the game than you'd otherwise

playing elements of Dark Sun because the programmers had actually given people personalities, and there's a sense of humour in there too. It's not quite up to the stage where you can type in the question you want to ask and get a relevant answer, but it's getting better.

At £45.99 Dark Sun – Shattered Lands is quite expensive for what it offers. Although the game is big and there is plenty to see and do, I would probably wait for the price to drop before recommending it."

Dave Renton is the editor of Role Player Independent magazine. His experience of RPGs in both their original and computer formats makes him a respected and informed authority on the subject

**REV
IEW**

AFTER MAKING ITS NAME RELEASING

SOME TOP-QUALITY FLIGHT SIMS,

MICROPROSE HAS

DECIDED TO BRANCH

Keith

OUT INTO THE

Steven

REALMS OF SPORT

AND, MORE SPECIFICALLY,

AMERICAN FOOTBALL.

NFL COACHES CLUB FOOTBALL

PAGE 68

AMERICAN football has become immensely popular in this country, with events such as the Superbowl being broadcast live, and college and NFL league games securing slots on network television. So far though, there has been no decent attempt to bring the game to the small screen of the PC. Microprose and Dynamix are both trying to rectify this situation however, with the release of NFL Coaches Club Football and Front Page Sports respectively.

NFL. Microprose's offering is more of a strategy game, with subtle overtones of arcade action, which attempts to bring the challenge of trying to coach a

"NFL, MICROPROSE'S OFFERING IS MORE OF A STRATEGY GAME, WITH SUBTLE OVERTONES OF ARCADE ACTION"

successful team in the NFL to a public that, at the moment at least, is crying out for all things Americana.

There is a minimal input from the player as far as actually 'playing' a game goes, with the emphasis being placed on careful selection of the plays involved, manipulation of the teams to ensure a winning side, and a general stance towards the position of head coach. The hands-on aspect only involves taking control of the quarterback and throwing the ball. The sport of American football is so tactical anyway that disregarding the strategies involved and concentrating on more of an arcade approach would have done the game a grave disservice, and I'm glad that Microprose also saw it this way.

To start off with, the choice has to be made as to what team you'll be taking control of. Every available team is at present playing in the NFL (in one of the four leagues), and its strengths and weaknesses have been modelled very closely on the real thing, allowing accurate and realistic matches to take place. For instance, you wouldn't expect the Seattle Seagulls to put up any kind of resistance against a class team such as the Washington Redskins or the San Francisco 49ers would you? Also if you happen to come across any of the truly great teams when you are coaching the Seagulls then you can expect to lose the match pretty convincingly, whatever gameplay strategies you employ.

The team selection should therefore be made very carefully, although there are plenty of opportunities later on in the game to modify and improve any part of the overall game plan so that, should

PRODUCT
NFL Coaches Club Football
SOFTWARE HOUSE
Microprose
PRICE
£44.99
REQUIREMENTS
386 with 2Mb, DOS 5.0, 5-7Mb hard disk space, VGA
SUPPORTS
Joystick, Mouse, Roland, Soundblaster, Ad Lib, Pro Audio Spectrum

you find that you are getting consistently beaten, things can be changed to improve your chances.

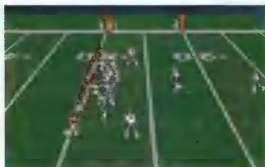
When choosing a team, an

appropriate team playbook will be loaded in, containing all the offensive and defensive plays pertaining to that team's particular style of play. There are

PICKING



Calling a time-out from any point during the game will bring up the stats screen showing you just how well the players are faring. The blue line indicates a healthy player, while a fatigued player goes through a yellow phase and finally, when near exhaustion is reached, a red bar is displayed



The ball has been snapped back, and it's time to see whether or not the tactics you decided on have worked. If not, it's back to the drawing-board



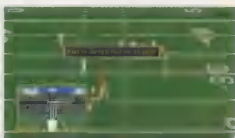
1 The first thing to do is decide what play you want or need to edit. From the list of plays displayed, simply highlight one and spend the next few minutes wondering just why the hell you told that 160lb running back to go and attempt to sack the opposition's quarterback



2 Once the play has been decided the screen will then change, allowing you to view the whole thing in more detail. This display can be zoomed in or out enabling individual players to be highlighted and changed at will

**REV
IEW**

A successful passing move is rewarded with the ref signalling to the crowd that you are indeed a fine player, and you should immediately be given the keys to the city. Probably



The player editing screen gives you total control over every aspect of a particular player's characteristics. Everything you change has an effect on how well the player reacts in the game

over 160 of these plays (80 defensive and 80 offensive) and, unlike most other games of this ilk, any playbook can be loaded in with any team. What this means is that there is virtually no limit to the style of play you can choose for a particular team. What if the Dallas Cowboys adopted a similar style of play to the Philadelphia Eagles? How would it affect the outcome of any matches that were played in the run-up to the Superbowl? With this system, these kind of questions are easy to answer just by loading in the appropriate style of play with whatever team you would like.

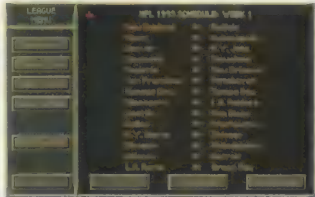
It should be noted that, while this will change the style of the whole team, it will not affect individual players. They will simply do their best to carry out any plays that you give them to the best of their ability. So if you were to ask a 170lb quarterback to try to barge his way through the opposition's line of scrimmage during the course of a running play, the chances are that he will end up getting sacked by most of the defence team. It's a simple system to use, but a difficult system to master. >



(Left) Once the players are on the line of scrimmage then you must decide if the play that you've picked is the play that you really want. Even at this stage of the proceedings, it's still not too late to change your mind

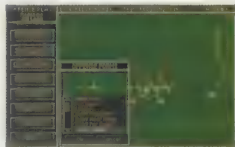


This is one of the more useless views, especially if you intend to control the quarterback yourself. From this distance you can see the whole of the pitch, but everything's too small to see what's going on

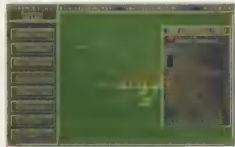


The strategic aspect of American football cannot be emphasised too much. The coach on the sideline, in conjunction with the quarterback, decides the type of offence to be used. The quarterback then tells the plan of attack in the offensive squad in the 'huddle' and explains the number codes to be used, for example 40, 35, 47, hut. These are what you hear the quarterback calling just before the snap, and allows plays to be kept secret from the opposition

PERFECT PLAYS USING THE EDITOR



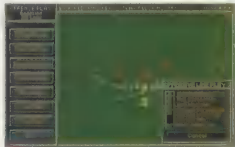
3 You can also alter the blocking formations that protect the quarterback from getting sacked. It's best to have some heavy defence if you decide to modify a passing play otherwise the likelihood of one of the opposition getting through the net and rubbing the quarterback's nose in the dirt will be quite high



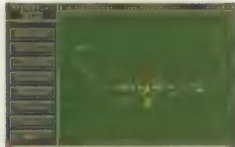
5 Altering where a receiver is going to run involves nothing more than clicking on the player and moving the 'elastic' line to the point on the screen you want him to run to, and clicking the mouse button. Again, more errors can be placed on top thus building up a complete play for one particular person



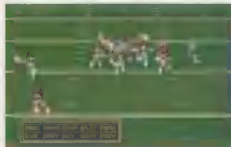
7 Before trying out the play in the heat of battle, there is the option of practising it against a selected team, just to see how it would work. Only the play you select will be acted out, and the whole thing will be captured on video allowing you to look back at it and assess its chances of proving to be a success



4 There are a number of options available to alter individual player characteristics, including the option to alter the amount of time the quarterback waits before throwing a pass in where the receiver is going to run to. Simply select the player to be altered and click on the relevant command



6 This is the final play. Notice how the tight and end of the wide receiver have been given instructions to run much wider and further than they were going to originally. Hopefully this will provide the chance to try and split the opposition's defence and gain the yardage needed for a down



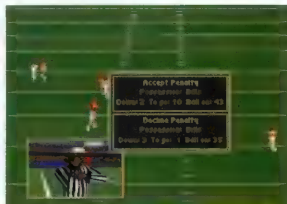
8 Any of the camera angles can be accessed from here, and the whole thing can be played forward, backward, in slow motion and in other configurations. It enables you to try things out before finding out. In front of 70,000 people, that the play you spent hours designing is a load of old cobblers

REVIEWS

Professional American football started in 1895 when a YMCA team which was short of cash played all-comers for money. It was not until 1920 that the American Professional Football Association was formed. The association was renamed the National Football League (NFL) in 1922.

Team playbooks can not only be loaded in at will, but they can also be modified to any lengths that you want. Using the playbook editor, any part of the play can be altered, whether it be where the receiver runs to and from, how long the quarterback waits before throwing to the selected receiver, and how and where the players designated to block do their job. Again, it's an easy system to use, but it takes a lot of knowledge to put the ideas that you have in your head onto the screen and make them work.

The actual game side of NFLCC is presented in a familiar 3D view that allows both teams to be seen on screen at once, with a vertically scrolling pitch keeping the key players in view at all times. The players are a little small to be seen clearly, but there is the facility to zoom in and out, as well as rotate a free floating camera around the pitch which should make things slightly better. As I said earlier though, this is not really a hands-on the quarterback game, and so



During the course of the game, any infringements of the rules will result in the ref popping up to give a verdict, both visually and verbally. The speech used throughout the game, although there isn't a great deal, is very good.



When play starts, it's up to you to decide on every move that the team will execute. In the first instance, you will be



Again, the ref has obviously spotted something that I missed. The animation used on the figure, although a bit slow, is very smooth and detailed.



The players tend to look a bit shoddy from this distance, but if you get in close then you can't see what's going on. There doesn't seem to be any middle ground between graphical quality and viewing area.

Apart from the many pre-set camera angles, you also have the option to rotate a free-floating camera through any angle. This gives you even more viewing angles with which to look at the mangle of bodies

ground. Right from the off, you are thrown into the deep end as far as tactics are concerned and from then on in, everything is in your hands, with the team carrying out your commands in the hope that they will come to something.

One of the things that you tend to forget when playing a game such as this is the fact that the plays you decide to call don't always go to plan. After each attempt at a down, a new play can be chosen. A small screen showing all 80

"FROM THE OFF, YOU ARE THROWN INTO THE DEEP END AS FAR AS TACTICS ARE CONCERNED AND FROM THEN ON IN, EVERYTHING IS IN YOUR HANDS"

the graphics don't have to play too important a part. What is of importance though is how deep you can plan your strategies when the game is in progress, and with how much flexibility.

presented with a choice of kick-offs. Either kick the ball far enough up the field so that you loose possession but gain valuable yards, or try a shorter kick to keep possession but risk loosing

FRONT PAGE SPORTS FOOTBALL PRO Vs NFL COACHES



FRONT PAGE SPORTS FOOTBALL PRO



NFL COACHES CLUB FOOTBALL



There are suddenly two American footy games out on the PC, so it would be considered wise to pit them against each other so that you can glean some idea of which one is more likely to suit your footballing needs. It should be perfectly clear from the following comparisons that Front Page Sports wins the contest hands down as far as presentation goes, but in a game such as this, that may not be important.

Both games have made use of flash graphics to illustrate the more mundane features of the game, such as the coin toss. This is really only an excuse to get the latest graphical techniques into the game, but it does look rather nice. NFL scores the highest mark here for using rendered players and a stunning backdrop. It's a shame that touches like this are only confined in the opening screens because they would have been appreciated in the rest of the game.

After every attempt at a down, there is the option of choosing a different play, whether it be of a defensive or offensive nature. Both programs allow you to do this, but Front Page Sports replaces the playing screen with a screen full of plays, making everything very easy to see and read. NFL, on the other hand simply gives you a small window listing the available plays. This isn't very clear and could have been implemented a lot better.

REV
IEW



AMERICAN FOOTBALL: THE BASICS

Although professional football teams often have up to 50 men, American football is played with 11 men on each side. Game time is divided into 15 minute quarters, making a total of 60 minutes. Obviously the winner is the team with the most points when the clock runs out. Points can be scored as follows:

TOUCHDOWN

A touchdown is worth six points and is gained either by a player carrying the ball into the opponent's goal-line – known as the end zone (EZ) or if they catch a legal pass in the EZ. A touchdown is also allowed if a 'tumble' is recovered by the defence team in the offensive's EZ.

EXTRA POINT

The extra point is taken after scoring a touchdown and is worth a single point. The ball must be kicked through the goal posts, above the crossbar and between the two uprights (like a conversion in Rugby).

FIELD GOAL

Like the extra point, a field goal is scored by kicking the

ball between the posts. A successful attempt is worth three points and the kick can be taken at any time during the game – the only limitations are the skill and power of the kicking player.

SAFETY

A safety is worth two points. If the defence manages to tackle the ball carrier in the offensive EZ, the points are awarded to the defence.

LINE OF SCRIMMAGE

At the line of scrimmage (which runs parallel to the goal-line), both the teams line up and face each other. The offensive line has possession of the ball, with a line of seven men at the front and the quarterback and receivers standing behind. The defence line can arrange itself in any way, providing all players are behind the line.

DOWN

To put it simply, the offensive has four attempts, known as downs, to get the ball 10 yards either by running or passing. If it manages this, a first down is gained and another 10 yards must be gained in the next four downs.

OFFENSIVE

The team in possession of the ball which is attacking to score.

DEFENSIVE

The team not in possession of the ball, defending its end zone.

KICK-OFF

The game always starts with the defence kicking the ball into the opposing side's half.

FUMBLE

If, during play, the ball is dropped by a player who is considered to be 'in control', this is classed as a fumble. This means that it can then be recovered by either team. The recovering team immediately becomes the offensive side.

INTERCEPTION

A defence player catching a throw intended for an offensive receiver. The roles switch immediately, with the defence side assuming offensive positions and vice versa.

END ZONE

The goal area at each end of the field.

The football Hall of Fame is a museum in Canton, Ohio where memorabilia from the football greats are displayed. Players are only eligible to be inducted into the hall of fame five years after retiring from the game. Statistically, quarterbacks are most likely to be voted in.

CLUB FOOTBALL - BOTH SIDES OF THE COIN...



The graphical representation of the game in progress is perhaps the most startling difference between the two games. NFL has gone for a look that is, quite frankly, a little dated. The players are small, ill-defined sprites, with the pitch and surrounding stadium portrayed in stippled graphics. Front Page Sports gives you big, bold well-defined graphics that take the guesswork out of trying to figure out why a play went wrong, because you can actually see it

Another neat, but ultimately pretty useless, graphical touch is the referees who tell you all key infringements and also react with the correct hand signals. NFL has again used rendered graphics, which do look very good, even when compared to the digitised refs that FPS uses. Personally, I would have preferred to have the refs left out and had the gameplay titled up a bit, but they look nice nonetheless

Redesigning and inventing new plays is the feature that both games make a big deal of. In FPS, the way you go about doing this is a little complicated, but NFL makes this process much easier by using windows to illustrate what the players are doing, what options are open to them and so on. Changing where a player runs to involves nothing more than altering the length and direction of a rubber line, and clicking on a new position. This is one feature NFL wins hands down

REVIEWS

DEPENDING ON HOW YOU LOOK AT IT...



There's not much to say here, apart from "I wouldn't like to be at the bottom of that pile of bodies!"

Everything that is changeable will have an effect on the outcome of a match. If a player has a fumble stat of seven (meaning that he is more likely to fumble the ball when receiving a pass) and that stat is changed to two, then any ball that is passed to him from now on is going to have a higher chance of being caught, which means a better chance of completing the downs and scoring goals. Likewise, if you decide to give a quarterback the medium passing ability of one, then all the throws he makes are going to be pretty much on the button as far as accuracy and distance is concerned.

By incorporating this into the game, along with all the other different play editors, there is an almost infinite scope for variety which means that every game should be different. NFLCC Football is a very good attempt at incorporating into a computer game everything that a football coach would be involved in.

The amount of plays on offer is impressive, and with the ability to customise almost every aspect of the game the scope for the sports strategist

"EVEN THOUGH GRAPHICS SHOULDN'T BE THE MOST IMPORTANT PART OF AN AMERICAN FOOTBALL GAME...WHAT'S ON OFFER IS A LITTLE LACKING"

is enormous. The problem is that it's not the most enjoyable game to play. Even though graphics shouldn't be the most important part of an American football game, there is no denying that what's on offer is a little lacking. The sprites are small and not overly clear, and the pitch and stadium are portrayed with stippling, even though there are 256 colours to play with.

The speed is also something that seems to be missing. On a 386, everything moves very slowly with full detail on, which includes nothing more than pitch markings and some static line judges. On a 486 everything is fine, but it shouldn't be that way, especially

NFLCC Football gives you the opportunity to watch the game in progress from virtually any angle and anywhere on the field. Obviously, some views are more helpful than others, but all can be used to give a clearer picture of just what the hell happened at that last, disastrous attempt at a down.



The default view is the one that is used most often. It gives you enough detail on the players to see what's going on, and enough field space to see what's coming up in the way of opposing players.



The quarterback's view is much the same as the default view, but seen from a slightly lower angle. It doesn't permit you to see as much of the play as the default, and so should only be used when trying to find out what went wrong.



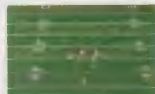
The defence captain's view is the quarterback's view reversed. Again, not much use during play.



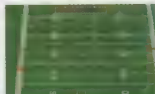
This is the sight that would greet you if you were the coach, sitting on the sidelines waiting for your team to make a move. Any discrepancies in the game can be seen quite clearly from this angle.



Just the reverse of the preceding view, the opposition coach's view can give you another angle on the gameplay.



The press box view is too distant to prove to him of any real use, although you do get the feeling of what it's like to sit in a nice comfy chair and commentate on the gameplay.



The blimp view is used to give a general idea of how players are positioned on the pitch. Absolutely no good for anything other than deciding if a field goal attempt could be a real alternative in a running play.



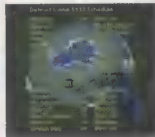
The ground level view is easily the most frightening view available. You too can feel the fear rising in your stomach as 240lb of running quarterback attempts to throw you face down in the dirt, all for the sake of a little leather ball.



Because the game has been affiliated with the NFL, the names and numbers of the players can be displayed during the game. The problem here is that it tends to slow down an already slow game and muddle up the display even further.



If you decide to get in really close, not only can you see nothing of the pitch, but the players take on the appearance of men made out of Lego.



It's a heavy schedule, with 16 matches to be played in a season. The top teams from each of the six leagues, plus a couple of wild cards, will eventually meet and do battle for the American football equivalent of the FA cup, the Superbowl.

your team has just executed has been successful or not, again due to the graphics. That said, the different editing systems are very easy to use, as is the play-calling system. Simply highlight a play that you think will work, and your team will attempt to see it through.

Out of the two American football games that are on offer, it would be very difficult to choose between them. Microprose has added everything that an aspiring NFL coach would need to complete his day's work, but in a package that is a lot less pretty to look at than the Dynamix offering. Both give you full NFL teams and player stats, and both offer luxury touches like video replays and play edits. The thing that swings it Microprose's way is the ease of use. Everything is fairly straightforward, and the menu systems used for the edit facilities is easy and intuitive. All in all, it's the one to go for if you want the best American football game.

SCORE ★★ ★

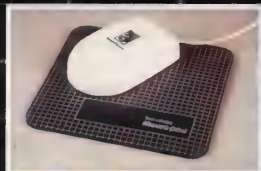
REVIEWS

Logic 3

Logic3

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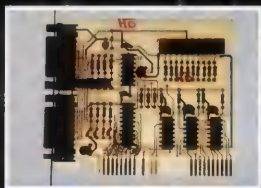
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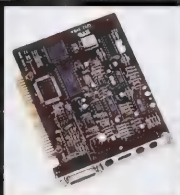
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GRIDIRON VETS DYNAMIX'S RETURN TO THE

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FRONT PAGE SPORTS FOOTBALL PRO

If you think the rules to American football are complex, just wait until you attempt to get to grips with the play editor in Football Pro. Complicated is an understatement – mind-numbingly confusing would be a more accurate description. Dynamix's Football Pro is an in-depth NFL sim that involves more thought than most other sports games. The on-pitch action is often controlled automatically, leaving the player with the task of coaching the team and choosing the play. I personally found that this made the game quite inaccessible, even more so considering the game's question is American football and the exact rules are unclear to many.

Football Pro is not a game that you can boot up and then simply go ahead and enjoy four quarters of gridiron action – initially you'll doubtlessly find yourself completely overawed by the complex nature of the game. Although it takes time to unfold the many layers of gameplay, locked deep within its seemingly concrete exterior there is a quality strategy sports simulation waiting to burst out.

From the menu screen a number of options are available. It's possible to start a game rapidly by choosing Quickstart which uses pre-set teams, weather conditions and game times. The exhibition match is basically the same as the Quickstart mode, but with various aspects now being user-definable, such as atmospheric conditions (Football Pro is so in-depth that it even allows the player to choose the humidity and exact temperature) and a choice of NFL teams.

"IN BASIC MODE...I DIDN'T FEEL IN CONTROL. I OFTEN SAT THERE AND WATCHED HELPLESSLY AS MY TEAM COCKED UP THE PLAY"

Alternatively a league can be entered. This option is for the serious player as a whole season can take hours. Consisting of either NFL or custom teams, the computer will work out a schedule for the season and request which games are to be played manually and which will be simulated.

PRODUCT
Front Page Sports Footballpro
SOFTWARE HOUSE
Dynamix
PRICE
£39.99
REQUIREMENTS
Dos 5.0 or above, 2Mb Ram, 25Mhz 386, 256 VGA, 11Mb Free HD
SUPPORTS
Soundcards: Soundblaster and compatibles, Thunderboard, PAS Plus/16, ADLib, Roland, Mouse (Recommended), Joystick

Each game will last an hour at least, depending on stoppages, although this can be shortened to either five or 10-minute quarter lengths.

After determining all the conditions of play, a menu of playcalls will appear. Sorry, a menu of what? I wasn't too sure

what the hell was going on either until I further inspected the manual. If the basic playcalls are chosen, all the team's moves will appear in their most basic form, for example a long throw right or run left. The player also has no control over his team after the ball is snapped.



CLEAR

Play a match in sunny California and the weather is almost guaranteed to be good. Clear is the basic setting, with little more than a breeze affecting the ball's flight



RAIN

The pitch is soggy and the rain is pouring down. The wind is stronger and the players tire more quickly after running through the mud



SNOW

The temperature drops below zero and the wind gusts, making it difficult to throw a decent pass. The players will suffer quickly playing in these freezing conditions



The screen changes to view the action from behind for any field goal or extra point attempts. The wind sock indicates wind speed and direction, and this can be adjusted for when you're using spin. The power bar on the right gauges how far the kick will fly

**REV
IEW**



Enter a league and create a team of your own. Design the home and away kits, then draw up the team's roster from thousands of different players



Here are two of the playcalls. At the top is the basic mode which simply explains the move, while the standard mode (at the bottom) shows the direction in which the player will run with lines. The advanced mode is just a series of numbers which are, to the untrained eye, very confusing

The standard mode, which in my opinion is the easiest, contains diagrams which indicate each player's movement path, allowing you to carefully plan where the ball will end up. Finally there's the advanced game which is just downright confusing. All 64 moves appear in a single box, represented by a load of numbers which mean nothing unless the game plan has been memorised or printed out. In both standard and advanced settings the player has complete control over his team. The joystick will move the highlighted player in any direction, with the buttons making the players dive, leap or throw the ball.

After wading through the ocean of options the game itself will begin. Following on from the coin toss, each team's play must be chosen before the game kicks off. Each match starts with the kick, followed by a variety of calls. With the call selected, the screen switches to the field where the team carry out your desired move. In basic mode I was a little disappointed with this because I didn't feel in control. I often sat there and watched helplessly as my team cocked up the play. At least in the two more advanced modes you have some control over what your team does and actually feel as if you are participating in the gameplay.

So while Football Pro caters for the enthusiast's every need, it forgets that there might be some of us who like American football but not to the extent that we'd spend hours thinking up tactical solutions for beating the Dallas Cowboys or whoever. No matter how hard I tried I couldn't really get into the game, even after several hours of play. I could control the basics of the game but had no real urge to see what else it had to offer. I understand the rules and enjoy watching the game on TV. Hell, I even support a team, but Football Pro just didn't excite me. Personally, I like to be in the thick of the action but instead Football Pro just left me standing on the sideline.

SCORE ★★★

REF'S HAND SIGNALS

Here are just a few of the hand signals that the referee will use to confuse you:



TIME OUT

Either time has run out or one of the teams is taking a time out to rethink their strategy



FIRST DOWN

10 yards has been crossed within the allotted four downs



TOUCHDOWN

The offensive side has scored a touchdown!



IT'S GOOD!

A field goal or extra point attempt was successful



FOUL

A foul has been committed. Either a five, 10 or 15 yard penalty will be incurred

PLAYCALLS - YOU CALL THE SHOTS



Football Pro's play editor is at first highly complicated. Brightly coloured lines drawn on a green screen will mean absolutely nothing to you until the manual is read thoroughly, and even then it takes a lot of time to work out a full team's playcalls

Once you've worked out the playcalls they can then be put to the test in the practice mode. Rather than making up plays completely from scratch, it's possible to rehearse any existing moves to suit your team



INSTANT REPLAY

The instant replays and live action can be viewed from a variety of angles. According to Dynamix, the instant replay option has been featured to enable you to learn from your mistakes by watching every play over and over again from almost any angle to see exactly what went wrong. Here are just a few camera shots:



Behind the offensive line, watching the quarterback's every move



Horizontally-scrolling gridiron action

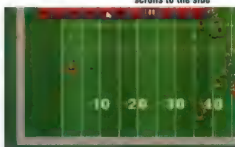


Watching from the Football Pro blimp. Here the pitch scrolls vertically

The camera swoops in low, just behind and to the side of the offensive line



We return to the blimp, but the pitch now scrolls to the side



REV
IEW

Gary Kasparov is probably the greatest chess player we have ever seen and has been world champion for the last decade. At present he is well on the way to defeating Britain's own Nigel Short



scale, the internationally recognised rating system for tournament chess players. Kasparov's claim in 1988 that no computer would be able to beat a Grand Master was shattered 10 months later by the most advanced chess computer ever, Deep Thought, a combination of advanced hardware and software.

However, on the humble PC, chess programs are some years behind this level of sophistication and are still subject to the pitfalls that the early dedicated machines succumbed to. Kasparov may have been surprised by dedicated hardware, but software alone isn't going to knock him down another peg or two for some years yet.

Determining Kasparov's Gambit's relative merits as a chess opponent was above my meagre skills however, so we

KASPAROV'S GAMBIT

WITH GARY
KASPAROV AS
by
RICHARD WOOD
Julian
CHAMPION, EA

**CERTAINLY HAS CHOSEN THE RIGHT NAME FOR
ITS CHESS PRODUCT. BUT IS IT GOOD ENOUGH
TO LIVE UP TO KASPAROV'S REPUTATION?**

EMPEROR

of France, Napoleon Bonaparte, was beaten in the 18th century by the first automatic chess machine, in 19 moves. Naturally the diminutive tyrant was less than impressed with his performance against Baron von Kempelen's automaton and duly stropped off. His response to the revelation that the human-shaped arrangement of cogs and gears was in fact manned by a midget Grand Master hasn't been recorded, although it probably involved invading some place or other.

Following that, automated chess didn't advance another pawn until the late 1950s - it took until 1958 to

PRODUCT Kasparov's Gambit
SOFTWARE HOUSE Electronic Arts
PRICE £44.99
REQUIREMENTS DOS 5.0, 386SX, 2Mb Ram, VGA, 11Mb HD, Mouse
SUPPORTS Sound Blaster, Adlib, Roland, Pro Audio Spectrum

programme a computer to even understand the rules and another eight years for one to achieve the standard of an amateur tournament player. It wasn't until the '80s that dedicated 'brute force' computers designed by computer specialists such as AT&T and Cray, eventually passed the US National Master barrier of 2200 points on the Elo

enlisted the help of Daniel King, Channel 4's resident Grand Master during the recent Chess World Championship, to offer his opinion. Before we get into the mechanics, we first need to talk about bells and whistles.

Presentation isn't crucial to the success of a chess game, but EA has delivered a very good-looking and, dare I say it, fun chess program. Even the most basic 2D representations of the board are elegantly marbled, the 32 pieces sitting upon it are all ray-traced, and should you decide to go for a 3D representation of the board, the options really open up. Four different chess sets are available, all ray-traced to represent different materials common to the construction of chess pieces, ie wood, marble etc.

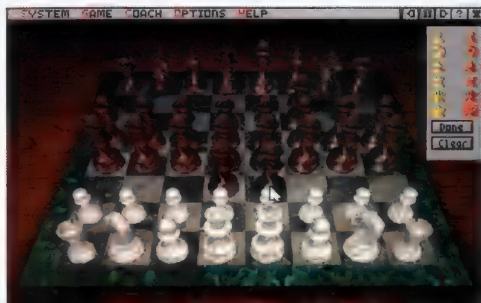
Sound isn't really an issue here, with the correct set-up some roughly digitised speech comes along as Kasparov offers advice. Oh yes, you aren't alone here, play anyone but Kasparov himself and



you can receive hints and see what the computer is thinking on a smaller board. Alas, this help is more akin to the "You don't want to do it like that" variety rather than "Bishop to e6 will give checkmate in three moves" sort! Any time he offers advice, Kasparov's picture animates and mouths the words in a fashion not unlike someone miming on Top of the Pops.

Games can be played in a number of different time frames, from the blitz mode (15 seconds per move), through tournament (40 moves in two hours), to the problem-solving area where the computer has 24 hours to make one move as it tries to find the best way out of a situation. This is where the set-up option comes in. Found yourself in a sticky situation but aren't sure of the best way out? Set up the problem and let the machine solve it for you, with all that time it should come up with a winning solution.

A vast range of famous name opponents are available to play against, ranging from Martin Luther King, through Ghengis Khan, onto Abe Lincoln, Shakespeare and that well-known chess aficionado, Marie Curie. Each have their own particular style of play and strengths and weaknesses which can be adjusted through five parameters: aggressiveness, creativity, attentiveness, orthodoxy(?) and strength. All players can be customised by adjusting these attributes on a sliding



Cheating isn't a recognised part of the game of chess, but with the set-up feature it could well become an integral part of the game, especially if I have anything to do with it



The main 2D playing screen contains all the information you should need to go about challenging Kasparov and the rest of the computer chess world. The lower right-hand board representation is where Gambit will work out its next move, allowing you to witness the inner workings of something that can out-think even a Grand Master!

is fantastic, brilliant, brilliant, and the way you can adjust your opponent's style - how aggressive, attentive etc, is very sophisticated. One complaint often

KASPAROV - A CHESS PLAYER'S CHESS PLAYER

"TO BE TRULY SUCCESSFUL A CHESS PROGRAM NEEDS TO BE ABLE TO GRASP TWO SEPARATE FUNCTIONS: CALCULATION AND ASSESSMENT"

scale. If you want Mahatma Gandhi to be incredibly aggressive then you just carry on and make him that way. If you want Josef Stalin to be a complete wimp, then the world is your oyster.

Daniel thought all this was marvellous. "The list of different players

aired about chess sims is that they always play the same game - well at least Gambit won't do that. Essentially, you've got unlimited opponents because you can change the way they play, which is fantastic, I really like that".

Daniel was curious to know if Kasparov's Gambit would overcome some of the flaws commonly associated with computer chess. "To be truly successful a chess program needs to have the ability to grasp two separate functions: calculation and assessment. Computers are very good at calculation, they can calculate a number of permutations from a certain position and see which move will be the most successful. They aren't however very good at assessing the strength of a position, it is difficult for them to see the positional benefits, to assess the strengths and weaknesses of where their pieces are on the board and in relation to one another. This often leads them to be very materialistic, concentrating on taking pieces and keeping hold of their own. They're going



Gary (formerly Gariik) Kasparov, possibly the greatest chess player that there has ever been, was born on April 13 1963 in a small, southern city of Russia. The young champion began to become interested in the game of chess at the early age of four, when he would solve simple chess problems that were featured in the local newspaper. Although neither his mother or father actually played the game to any high standard, they began to teach their son the basic rudiments of the game, and sat back to watch him learn.

In 1975, at the age of only 10, Gary won his first tournament in his home town of Baku, earning a master's norm. The following year he went to Moscow, excited at the thought of playing against some Grand Masters including the ex-world champ, Mikhail Tal.

In 1978, Gary himself achieved the status of Grand Master, still at the remarkably young age of 15. Along the way, Gary forged a new kind of chess playing, commonly called 'fighting' or 'firebrand' chess and to this day he is still thought of as a very aggressive kind of chess player. Kasparov became the 13th world champion (a number that he considers to be extremely lucky) and is at present defending that same title against Britain's very own Nigel Short.



Daniel King, International Grand Master and one of Channel 4 and BBC Player's panel of chess experts



for the material gain, which is important, but often they find it difficult to offer a sacrifice or an exchange for positional advantage. Similarly, they will often make a positionally-suicidal capture purely for material gain – gain which is often short lived. You need to be able to assess a position and see if it is OK for what you want to do. In tactical, sharp positions where you have these sorts of amorphous positions in which it isn't absolutely clear what you are trying to do, often computers aren't very good. A human normally knows what is going on, but computers don't."

An early example of this came in a game against Kasparov's character, who has the highest rating of all in the game. Everything had gone well up to the sixth move; the computer had responded sensibly to white's safe opening, opting for a French Defence. Then all of a sudden, black's queen, conservatively positioned on the 8th rank, dived on white's pawn on b2, apparently looking to take on a single-handed massacre of white's queenside minor pieces. Not a bad tactic, but black's defence was seriously weak to support such an early attack – in short it was going for the material advantage and forgetting the positional aspects. Surely it hadn't revealed such a flaw already?

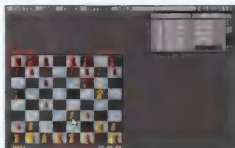
Well, not quite. The next game Daniel tried to catch it out again using a different, slightly less orthodox opening, but this time its positional play was nearly flawless. It did however make one error which led to a confrontation in black's kingside corner – white's queen, knight and bishop were all bearing down, but in this instance it was defending brilliantly, staving off the inevitable for some time. Naturally Daniel was victorious. This led Daniel to ponder one of the computer's great strengths, "The one good thing about computers is that they never get flustered, the clock doesn't worry them, you can't harass a computer!".



A solid defence, but for some reason black has brought his queen out...
...Straight down to b2 – This is how reckless the computer can be when going all out for material gain



This is more like it, a good solid French Defence, or the beginnings of one at least...
...Then it goes and blows its defence by bringing its knight out too early, hoping to pick off one of my pawns, no doubt. This is the kind of play Daniel described as "crap"



Then again, when you play Kasparov, things get tricky. His threat of material resulted in check in live moves, but then I'm a bit useless anyway



This is unusual – black offered an exchange of queens very quickly. Here you see white's queen about to be nabbed

Its response to standard openings and gambits was poorer than expected. It certainly provided variety, but not always strength. On one occasion it offered a very strong Karl Haan defence, textbook stuff. On another though, it began a French Defence but abandoned it after one move and brought its king's knight out. Daniel succinctly noted that this was "crap".

The reason for this inconsistency lies in two factors, selective searching and the horizon effect. If we assume that at a basic level a computer will examine all the permutations, say six moves ahead,

selective searching follows the most obviously successful through to a further three or four beyond the initial six. This depth gives it the opportunity to create positional strength.

The horizon effect comes in when no one permutation is clearly successful and it looks no further forward than the prescribed six moves. If a material gain can be made in those six moves then it goes for it, without looking at the potential danger in the seventh move beyond its "horizon". Socrates II, the system behind Kasparov's Gambit, is more sophisticated than this simplistic

SOCRATES II - A NEW KIND OF CHESS PLAYER

The date is February 17, 1993. The place, Indianapolis. Inside an unassuming building a battle is taking place that could well mould our future view of technology. 12 computer chess programs are going through their paces in the 23rd International Computer Chess Championships, with the winner picking up a meagre cheque for \$4,000.

Eventually the winner was Socrates II, the same chess engine that powered Kasparov's Gambit. Developed by Don Dailly and

Larry Kaufman, it's possibly the most advanced chess engine to appear on any home computer system. When you consider the fact that Socrates II was up against systems that were running on massively powerful systems (the Cray blitz, for example), and that Socrates was only using a 486 PC, it puts things into perspective somewhat.

Assistant tournament director and International Grand Master Danny Kopec noted that "Human Grand Masters look at up to 50 to

100 positions per move. Compare this with something as powerful as the Cray blitz which looks at 100 million positions per move, and you'd think that the computers would win every time. The problem is, a Grand Master can recognise about 50,000 rules and yet there has been no effort to codify these rules into chess engines".

Socrates II has attempted to rectify this, but with so many recognised rules, the massive amounts of data that needed

would have to be run off something that's going to make the average 486 look like a Sinclair ZX81! Artificial Intelligence routines have been tried but have proved to be disappointing. Why can a computer that calculates millions of moves a second not beat a human player? Programmer Barry Levinson predicts that "within 10 years the human chess champion will be beaten by a computer". If this proves to be correct, the age of the computer will just be beginning.

REV
IEW

1. F2-F4
Bird's Opening. Named
for Henry Bird, it is a
fully respectable



Throughout the game, Kasparov is on hand to comment about any moves you make, be they particularly good or as ill my case, atrociously bad



White is definitely in deep trouble against Emperor Charlemagne – lousy position and material down. Deep trouble!



Fiddliesticks! White's been caught by a rather elegant checkmate manoeuvre. Kats off to black and a big "get some more practice in" in white



It just gets worse! Here you are barely a hair's breadth from disaster, but white still ploughs on regardless



To an amateur like myself, the computer opponents can be frustrating in their mercilessness and pitiful in their naivety. Her black is in full merciless mode

summary indicates, but the basic problems still remain. Yes, Kasparov's Gambit does have the capability to assess its position, but in our experience this was generally overruled by an unquenchable thirst for material.

On the plus side, it certainly wasn't slow in exploiting an error Daniel made with the mouse. Our Grand Master had built a strong position, impervious to a maverick attack by black, but one slip meant the queen went to the wrong square and within four moves black had checkmate. An impressive performance.

The final test was to play it against itself and see if the traditional dull, safe play found in numerous computer chess programs was also apparent here. We pitched Josef Stalin against Martin Luther King, two of the century's more colourful characters, and sat back to watch. Both sides played a typical computer Vs computer game that was amazingly dull and very safe. "The computer's attitude is that it is very silly to give away material. I mean, it's right basically, but sometimes you'd think it would realise that you have to make sacrifices to gain position," commented Daniel.

So, up until now we have seen a computer going for material gain and

safe play most of the time, just as most other computer chess games have down the years. What has been surprising is the amount of unpredictability shown when playing a human opponent. Daniel was particularly surprised at the way it handled openings. "That was quite strange because in some of the games it played quite a theoretical response,

"SOME MOVES IT PLAYED VERY WELL, BUT OTHER MOVES IT PLAYED LIKE A COMPLETE... SO FAR IT'S BEEN VERY VARIED, IT HAS PLAYED A WHOLE HOTCH-POTCH OF DIFFERENT STYLES"

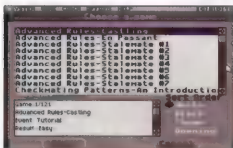
whilst in others it went completely off the wall." And in general play? "Some moves it played very well, but other moves it played like a complete... So far it's been very varied, it has played a



The option to configure a board to your liking is a very useful option to have available. With it you can see how the computer is going to react when you try and close the game with a recognised finishing flurry



Attributes are what the opponents are all about. Described by Daniel as "fantastic", this allows each opponent to be almost infinitely varied, and boy does it show in the playing styles



Kasparov's Gambit contains a large library of tutorials allowing someone relatively new to the game of chess to quickly pick up some of the more professional aspects of the game. If you've ever wondered just what the classic opening move of all-time is, then load up the relevant tutorial and away you go

whole hotch-potch of different styles. Overall, the strengths of Gambit really aren't any greater than those of a lot of other chess programs I've played. But it is fun, I like it and I'm sure it would help an amateur improve his game. This is good fun, just as chess should be!

While Kasparov's Gambit doesn't stand up to the test of a Grand Master,

having much the same flaws as any other chess game, its one great strength as acknowledged by Daniel, lies in its varied playing methods. OK, maybe it will always go for material gain, but at least you know full well that it is usually going to go for different material in a new way every time.

To me, you can't really ask for more from a game of computer chess – each time you play Gambit you will be faced with new challenges, and while its inability to grasp positional play in any great depth takes the edge off its game, there is no way playing against Kasparov's Gambit will ever be dull. In this way at least, some of the great player's spirit has definitely been captured.

SCORE ★★★

REVIEWS

RECREATE HISTORICAL BATTLES OF THE

by
1940'S SOUTH PACIFIC IN QQP'S GAME

Alex

FOR THE STRATEGICALLY

Simmons

MINDED.

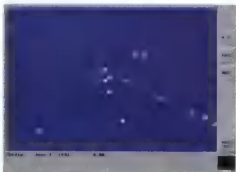
WORLD WAR II BATTLES OF THE SOUTH PACIFIC

BATTLES

of the South Pacific (BOTSP) is one heavy son of a bitch. Playing this strategic beast is like staggering through a swamp with a sackful of bricks on your back – it's difficult to get into and one wrong move and you'll get sucked under by the overwhelming depth of gameplay. It's possible to finish BOTSP within hours, but you'll have merely scratched its surface as only the very basics of the game can be learnt in such a short time. Learning about naval, aviation and military tactics takes at least a week, with some campaigns lasting over a month in real time! General Patton didn't rise to the top of the American army within days of signing up, so patience is vital!



Battles of the South Pacific is by QQP, the chaps responsible for the highly acclaimed Perfect General series. BOTSP can be enjoyed by two human commanders on the machine or via a modem. There are three depths of gameplay ranging from the short Quickgames, the battles which take around six hours and the campaigns which often take a month or so



The blue icons represent the US fleet while the red indicate a Japanese task force. If you look closely, the battleships, submarines and carriers can be distinguished from each other



The circular rings indicate the range of the task force. The icons down the right-hand side switch between task forces, other carriers and troops. Further down are icons to alter speed and issue orders to attack and move. At the very bottom is the command to end turn

"IT'S POSSIBLE TO FINISH BOTSP WITHIN HOURS, BUT YOU'LL HAVE MERELY SCRATCHED ITS SURFACE"

Battles of the South Pacific recreates the war fought between the Americans and the Japanese, mainly concentrating on the vicious encounters between the two naval forces. There are three levels of depth to the game. Picking the Quickgame will enter the player in the most basic game combat theatre, a simple battle between the two armies. The battle option is a little more complex, with a short scenario that teaches the player further elements of strategy. The campaign setting offers a full-scale skirmish with literally hundreds of ships, troops and aircraft under your control. The engagements last anything from a couple of hours for a Quickgame to weeks or even months for a campaign. Obviously an entire campaign cannot be fought in a single sitting, so the game can be saved at any point and restored later on.

The player chooses the American or Japanese fleet, with the opponent being played either by the computer or a human. The two forces can battle against each other on the same machine or through a modem. Various aspects of the game, including the computer's skill level and weapon effectiveness, can be altered to one of three settings.

The game is entirely mouse-driven through a series of icons and menus

PRODUCT

World War II: Battles of the South Pacific

SOFTWARE HOUSE

QQP/Mirage

PRICE

£44.99

REQUIREMENTS

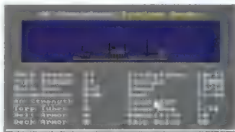
DOS 3.3 or above, 1Mb RAM, 386 (+12MHz), 256 VGA, Mouse, 6.5Mb Hard Disk space

SUPPORTS

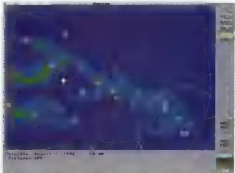
AdLib and Soundblaster Sound cards, Modem

that pop up when the order phase comes round. When it comes to giving an order, the ships have been divided

into separate task forces made up of anything from two to 20 ships, to make the thing run more quickly. Separate



In the campaign game many factors need to be considered. Refuelling is vital to keep your fleet on the move, as are extra supplies and munitions



The hidden menus at the top of the screen pull up list upon list of statistics, noting friendly and enemy casualties, the weather forecast for the entire Pacific (it does affect your fleet), and the range circles (red for Japan, blue for the USA) among other options

**REV
IEW**

Aircraft kills are notched up on screen, awarding points to the appropriate army for each plane knocked out. Bombing runs on land bases are also shown in the same way, substituting the kill icons with bombs



Squad	Type	9	exp	morale
147	F4F	23	85	88 C
148	SBD	17	88	88
149	TBD	13	88	88
Capacity			75 / 96	
Operations left			27	
Deck Damage			15	

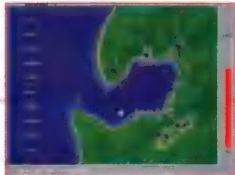
The Americans are real sticklers for statistics, which is probably why Battles of the South Pacific is full of them, with numbers everywhere you look. If you hadn't already guessed, BOTSP is not the easiest of games to get into

BORED-GAME BLUES

APART FROM THE OVERHEAD SECTION OF BATTLES OF THE SOUTH PACIFIC, THERE ARE SUB-GAMES WHICH HAVE ALSO BEEN INCLUDED TO BREAK UP THE MONOTONY. HERE THEY ARE IN ALL THEIR GLORY:



When a fleet is attacked by enemy aircraft, it's your job to line the boats up in formation so little damage is sustained. However, the bombers were pretty effective no matter how my ships were arranged



The result of bombarding a coastal base is worked out entirely by the computer, with any direct hits notched up on the damage indicator on the right. The base isn't defenceless though, returning fire with gun turrets



The ship versus ship battles provide the most enjoyment as you have complete control over each vessel's movement and cannon fire. Simply pick your target and the computer works out any hits or misses

orders can issued to individual ships, but commanding a fleet of over a hundred vessels individually could take hours!

The orders are initially quite simple, moving the fleet into attack position and adjusting speed. When opposing vessels near each other, things start to get a bit more complicated. The task force can be engaged in a number of ways, with the simplest way being to track-and-attack the target – this task force will follow the enemy, attacking until the unit is either destroyed or out of sight. Carriers will attack with aircraft, and battleships will open fire with their heavy guns. The player has some control over the battle, choosing which ship to target when the boats near each other. Each combat phase is divided into three rounds, effectively allowing each ship to move and fire three times. Attacking a naval base is slightly different – the fleet lines up along the coast and bombards the shoreline with shells. A damage metre on the right indicates the status of the base, which returns fire when attacked.

When undertaking aerial bombardments, the aircraft-carrier can be ordered to initialise standard or full strikes, launching aircraft which then fly out to bomb the ships, base or whatever target is selected. The opposition has the chance to arrange its ships before the aircraft fly over and drop their payload, the results of which are worked out by the computer and the appropriate vessels sunk under a hail of explosives.

Fleets often include transport ships that carry tanks and troops which can be disembarked when they reach the shore. They then become separate units which can attack enemy HQs or create bases of their own. Supplies, reinforcements

and refuelling are all vital aspects of the campaign game, making it a very deep and complex affair with thousands of factors to consider.

"IT IS AN EXTREMELY COMPREHENSIVE STRATEGY GAME WHICH INVOLVES A LOT OF TIME, CONCENTRATION AND THOUGHT TO SUCCESSFULLY COMMAND AN ENTIRE FLEET OF WARSHIPS"

It is because there is so much to remember and so many units to control that Battles of the South Pacific is such a daunting prospect. It is an extremely comprehensive strategy game which

involves a lot of time, concentration and thought to successfully command an entire fleet of warships plus the troops, armoured divisions and aircraft they

carry. I doubt that BOTSP will crack the PC market as a whole, but it will certainly be a very satisfying challenge for die-hard war tacticians.

SCORE ★ ★ ★



The hourly report indicates that 17 Japanese fighters were shot out of the sky compared to 13 American planes that bailed out. No ships have been sunk



The Midway base can choose to launch seaplanes to patrol the coastline, or attack a nearby fleet with gun emplacements and aircraft



There are loads of terms which will confuse the uninitiated. CAP, for instance, means Combat Air Patrol. Initially, I suggest the manual should be read carefully, then try the Quickstart game



Detailed damage reports can be pulled up on every ship in the fleet. The report reveals the damage status of the vessel as well as the morale of the men on board

REVIEWS

RANTINGS

BY THE POISON PEN

What have we had so far then? 7th Guest...a collection of mind-numbingly complex puzzle games rendered in

"WE'RE CURRENTLY BEING SUBJECTED TO ENDLESS AMOUNTS OF GRATUITOUS FULL-MOTION VIDEO (FMV) SEQUENCES AND PRE-RENDERED GRAPHICS"

glorious SVGA which requires so much processor and CD drive activity that it looks absolutely abysmal on anything less than a DX2. Oh yes, and some wise soul deemed it necessary to charge over 60 quid for the bloody thing. Surely a double pack CD game shouldn't cost more than a disk-based game requiring 12 floppies? What else?

Erm...not a great deal really. Aside from this seemingly lonesome CD specific title there has been nothing except a whole bunch of shovelware fobbed off as 'multi-media' products.

Let's take a moment and examine the much banded expression 'multi-media': Consulting the dictionary we learn that the expression is formed of 'multi', meaning more than one – and 'media' meaning a method by which 'information is conveyed'. Well, yes. Thank you for that. So this is basically justified on the computer entertainment front by the fact that some out-of-work actor gets to talk in the background of your new game? I am impressed.

What "multi-media" extravaganzas have we been astounded by so far? A whole load of re-released games with lip-synched speech or alternatively an old game re-packaged with a snazzy new intro sequence. OK, I'll admit that the software houses obviously think that 'people with a CD ROM who haven't bought the game before will buy the CD version', but what about the rest of us? I want something new, something

impressive...even something which is released at the same flamin' time as the disk version.

The snorer that people realise that CD isn't a fabulous new medium the better. I have no doubts that it will revolutionise the PC games market, but not in the way which everyone wants. A CD is nothing more than an easy method of storing an enormous amount of information. As games become more demanding with more complicated graphics and sound the amount of hard drive space which they take up becomes greater. Look at Strike Commander - 35Mb of space to get the thing running in its 'full' form and then all you get is a pretty shoot-'em-up trying very hard to look like a flight sim.

In any new format's infancy, the 'pioneers' tend to abuse what they believe are the system's strong points. With CD ROM we seem to be going through this infancy right now. We're currently being subjected to endless amounts of gratuitous full-motion video (FMV) sequences and pre-rendered graphics. Yes, it looks great, but it doesn't really add to the enjoyment of the game does it? Soon you find yourself desperately trying to skip past the 'lovely' animations just so you can find what little gameplay many of the products actually offer.

For now maybe we'll just have to put up with all the expensive graphics demos until someone susses that people actually want to play games and not just look at them. ■

[illegible]

Issue Two

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GAMES ROUND-UP

IN THIS SECTION PC PLAYER WILL REVIEW
SHOOT'EM-UPS, BEAT'EM-UPS... YOU KNOW,
THE GAMES THAT DON'T REQUIRE TOO MUCH
THOUGHT, ALONG WITH CD-ROM AND
UPDATES OF
GAMES
PREVIOUSLY AVAILABLE.



CLASSIC GOLF

KONAMI

£29.99

REQUIREMENTS

500k RAM, DOS 3.0 or above, 286 (+12MHz), 256 VGA

SUPPORTS

Soundblaster, AdLib Sound Cards, Mouse

Classic Golf is going to have a tough time competing against the Links series, because the US Gold games have the added advantage of digitised golf courses and a variety of add-on course disks. Mind you, I thoroughly enjoyed playing Classic Golf. It's easy to play and for a beginner like myself it's very accessible.

Up to 10 players can compete in a round of 18 holes with each golfer individually honed to suit personal taste and skill. To add to the basic game there is a matchplay option, two skins game modes and something called Bingo Bango Bongo. Don't ask me why it's called that, but for each hole three points are awarded: one for the first ball on the green, another for the closest ball to the hole when both are on the green and the final point is awarded for the ball that drops first.

Although Classic Golf doesn't have the flash visuals of Links, it plays a damn good game of golf. It can be as easy or difficult as you like, making it suitable for both beginners and experts alike. Probably the most impressive feature of the game is the speed at which it updates the course. This has often been a problem in golf sims, but thankfully Konami has ironed out this niggle and produced a simple but enjoyable game.

SCORE ★★★★★

BATTLE CHESS

INTERPLAY

£44.99

REQUIREMENTS

DOS 5, 2Mb RAM, 386SX+, 256 Super VGA,

CD-ROM (+150K/Sec)

SUPPORTS

Soundblaster, ProAudio Spectrum Sound Cards, Mouse (Recommended)

Battle Chess has always been an easy introduction to the world of chess because it includes a welcome sense of humour. The little chess pieces march proudly across the board in full armour, and when the time comes to attack another piece they draw their swords and fight it out in front of you! Mind you, it's hardly a new concept – the original game appeared back in '88.

Battle Chess, the '93 CD-ROM version is basically the same game but with a few enhancements. Obviously the sound has been vastly improved. Each playing figure has its own piece of music, from the bishop's orchestral melodies to the pawn's marching anthem. There are also loads of meaty sound effects that clang away during a sword fight.

Although it has been improved cosmetically, it still suffers from appallingly slow gameplay. With the animation on, it sometimes takes over 30 seconds to wander up the board and take another piece. You can speed the process up by installing most of the information onto your hard disk, but this takes up an extra 33Mb of disk space! Another way of rectifying the speed problem is by playing on the 2D board, but surely the whole point of Battle Chess is to gaze in awe at the graphics?

SCORE ★★★★★



LORD OF THE RINGS

INTERPLAY

£44.99

REQUIREMENTS

DOS 3.3, 2Mb RAM, 386SX+, 256 VGA,

CD-ROM (+150K/Sec)

SUPPORTS

Soundblaster, ProAudio Spectrum, AdLib Gold Sound Cards, Mouse

The CD-ROM version of Lord of the Rings is every bit as good as the basic floppy version, plus it includes enhanced digital sound effects and a full stereo soundtrack. What's more, there's over 20 minutes of footage taken from the Lord of the Rings animated motion picture.

If you're not familiar with the original, you take the role of Frodo Baggins with your aim being to destroy the master ring. It follows both the book and film quite closely, with Frodo and co encountering the Nazgul, ringwraiths of the Dark Lord Sauron. Most of the action is viewed from above as the party treks across Middle Earth, chatting to elves and other strangers to hopefully make their way to Mordor.

Lord of the Rings is three years old and looks quite dated now, although it's still as absorbing as ever due to there being such a lot to do – the 9,000 screens that make up Middle Earth will take hours to explore. My only (minor) gripe is with the control system. My party kept getting stuck behind trees and I had to turn around and look for an easier way around!

SCORE ★★★★★





PINBALL DREAMS

21st CENTURY ENTERTAINMENT

£34.99

REQUIREMENTS

DOS 3.3, 500K RAM, 386 (+20MHz), 256 VGA, 2.5Mb Hard Disk

SUPPORTS

Soundblaster, ProAudio Spectrum Sound Cards, Mouse (Recommended)

Pinball Dreams first rose to success on the Amiga a couple of years ago and is now available on the PC. Amiga conversions haven't been very good of late, but thankfully Pinball breaks this mould. It features four tables and the object is...well, you know what pinball is so there's no need to explain!

The tables vary in difficulty with my personal favourite being Nightmare. Like so many of the pin tables around at the moment, Nightmare has loads of ramps, jackpots and traps to shoot the ball at to amass millions of points, but the real beauty of the game is learning what each bit of the table does. By hitting the obstacles in order the jackpot can be doubled or even tripled, and multiple bonuses are triggered by accurately shooting the ball around the loops. The other tables are similar, but obviously are laid out differently. For a tougher challenge try the Ignition table. There's not much to aim for, making it a fast table to play on.

As pinball is virtually non-existent on the PC (the only other game I can remember is the Sierra pinball for windows thing with Leisure Suit Larry which was very poor), Pinball Dreams obviously rates among the best. It does look, sound (the music through the internal speaker is surprisingly good) and play like an Amiga game, but this is no great tragedy when you consider how good the original was. Pinball Dreams is good harmless fun, simple yet enjoyable.

SCORE ★★

GOAL

VIRGIN INTERACTIVE

£35.99

REQUIREMENTS

DOS 3.3, 386 (+22MHz), 256 VGA, 1.8 Mb Hard Disk

SUPPORTS

Soundblaster, AdLib, Roland Sound Cards, Joystick

Geez, I found Goal difficult to play. The problem wasn't with the game's control system, it was mainly due to the analogue joystick. These sticks are fine for flight sims, but when it comes to action games like Goal they are just totally unsuitable. You have to physically wrench the joystick to get the players to run in the direction you want.

Goal is an enhanced version of Kick Off 2 but with loads more options, teams and an improved control system. To be honest I couldn't find much evidence of the improved controls as I explained before, but there certainly are more teams and a load of game options.

For instance, there are over 100 national and international teams and four game types, including a single friendly game, a league (in which up to 32 teams compete), the Goal Cup and finally arcade mode. There are also four different pitch types, with even a setting called Wembley...hmm, it didn't seem much different to me.

So in my opinion Goal is a bit of a let-down. At the moment this sort of game is best suited to the Amiga, so why not leave it at that?

SCORE ★★

STREET FIGHTER II

US GOLD

£29.99

REQUIREMENTS

DOS 5, 1Mb RAM, 386 (+25MHz), 256 VGA/MCGA,

SUPPORTS

Soundblaster, Roland, AdLib Sound Cards, Joystick (Recommended)

Yet another action game which is good on consoles that specialise in arcade games, but on the PC is diabolical, no matter how fast the machine. However, this time it's not entirely the fault of the joystick. Having played some of the more impressive versions of Street Fighter II (especially the Super NES game), the PC incarnation is lacking in virtually every department. Visually it looks OK...providing it's not moving. The sprites are fairly big and colourful, but as soon as the action starts, everything goes downhill.

It's difficult to choose a starting point when criticising SFII, but I'll start with the presentation. It's abysmally slow on every PC machine I played it on, even on a 486 33MHz. The characters don't jump through the air, they glide.

If you've bought a PC to play this sort of game, you've wasted your money. Stick to more in-depth games and leave the beat-'em-ups to the consoles.

SCORE ★

BLUE FORCE

Tsunami

£39.99

REQUIREMENTS

DOS 5, 600K RAM, 386 (+16 MHz), 256 VGA, Mouse, 11Mb Hard Disk, CD-ROM (+150K/Sec)

SUPPORTS

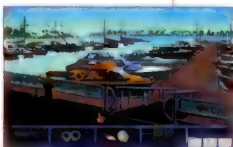
Soundblaster, Roland, AdLib Sound Cards

Created by the author of the Police Quest series, Jim Walls has written yet another game on a day in the life of an American policeman. How long will this go on for? It was quite novel to begin with, but now the idea is wearing thin, and judging by this sub-standard CD-ROM game, so are his ideas.

Cast as rookie motorbike cop Jake Ryan, Blue Force plays, unsurprisingly, like a Sierra game, moving the mouse to click on various icons, it is your job to solve the murder of your parents which happened some years ago. Tsunami boasts that this 'realistic' cop game is pretty close to the real thing, but one tiny detail I forgot to mention was that gameplay has unfortunately been sacrificed to produce this realism. While I may feel as though you're really doing your job when you're out on the streets, does the prospect of filling in reams of paperwork sound interesting? No, I didn't think so. There's far too much pen-pushing and not enough cops 'n' robbers.

This game needs more action, and sadly even the CD-ROM version is lacking that.

SCORE ★★



TORNADO

**TORNADO MAY BE ONE
OF THE MOST
IMPRESSIVE COMBAT
SIMULATORS TO APPEAR**

**FOR A VERY LONG TIME, BUT TO GET THE MOST OUT OF IT YOU'RE GOING
TO NEED TO DEVELOP SOME VERY NON-STANDARD FLYING TACTICS.**

THE Tornado is the world's most advanced ground attack aircraft. Capable of hugging the terrain at altitudes of less than a hundred feet, and at speeds in excess of 600knts, it's the most deadly air to ground aircraft that has ever flown. Tornado, the game, simulates this incredible feat with startling accuracy. It's up to you to control every one of the Tornado's systems, taking on the role of both pilot and navigator. Use all the latest weaponry and radar systems to deliver your deadly payload to within six inches of the target. It's not an easy task, but with a little outside help from this guide, things should hopefully get a bit easier. Let the battle commence.

GENERAL HINTS ON THE CAMPAIGN AND COMMAND MODES

When playing the game at this level you're going to have to keep a clear head because there's going to be a lot of planning to do. Whichever map you're playing the campaign over, the amount of targets will be daunting and there will be a tendency to just get out there and destroy things for the hell of it. My advice is don't – apart from endangering yourself and other planes, it is usually a waste of time, effort and resources.

The idea in the campaign is to win the war and the most effective way to do this is to try and sap the enemy's morale down to a level where they will be incapable of fighting a battle, let alone winning one. Morale is directly linked to both allied and enemy abilities and is the major factor that you should concentrate on. So how do you go about achieving this? The first thing to do is learn which targets actually make a difference to the objective you're trying to achieve and which ones are nothing more than 'fillers'.

Targets that are definitely considered morale sappers include:

**POL INSTALLATIONS (INCLUDING
TANKS AND FARMS)
HARDENED MUNITIONS STORAGE
FACILITIES
COMMUNICATIONS CENTRES
HARDENED FUEL STORAGE FACILITIES
EARLY WARNING RADARS
CONTROL TOWERS
BUNKERS
SCUDS**

One of the above would be considered a legitimate target, especially the POL ground structures. Imagine if you didn't have fuel enough for your vehicles or the necessary lubricants to make the very same vehicles run, and if the industrial centres of your country weren't able to manufacture produce because of a lack of chemicals. These sort of things are renowned for greatly reducing a fighting force's morale.

Apart from the targets mentioned above, secondary targets that could also be considered include:

**BRIDGES
WATER TOWERS
POWER STATIONS
CAMOUFLAGED SITES**

Only cite these as targets when you are well on the way to scoring a major morale victory because any aircraft lost attacking secondary targets will seriously hamper the outcome of the campaign.

ALL IN THE RULES OF ENGAGEMENT

The key to success relies heavily on what targets you decide to hit, and how. It's no good sending in a six Tornado strike, against something that's relatively lightly guarded, such as a bridge or a camouflaged site because this would be a waste of resources. Decide what you want to hit, how many (or few) planes it's going to take to achieve your objective, and what the likelihood of stiff opposition is.

An enemy control tower is going to present you with some problems, because to get near enough to it you're going to have to alert the local ground and air forces. A six Tornado co-ordinated strike is recommended for a target such as this



POL farms, considering their importance in the grand scheme of things, are left poorly defended and should present very few problems when handled properly hit with a three or four plane strike to knock out all of the tanks and suppress any AAA or SAM defences present



SCUDS are difficult to locate due to the fact that they are mobile and are usually part of a multi-vehicle convoy. Great care must be taken when engaging them because mobile SAMs will usually be found in abundance in thwart any plans you may have



Bridges aren't guarded and will prove to be the easiest things in the campaign to knock out, having little or no direct defence connected with them. Care should be taken to avoid enemy ground force activity when planning, and so increase your chances of success



Communications towers are very good targets to knock out, being fairly 'soft'. It only takes one plane strike to neutralise them

Camouflaged sites will usually be placed a fair distance from any major AA defences and will only need a single plane mission to achieve a strike



DEFEATING A MIG - A BLOW BY BLOW ACCOUNT

The way to defeat the enemy is to exploit his weaknesses, which in this case are the very same weaknesses that make him so

dangerous - his flying ability. The computer pilots, although very good are too rigid in their approach to dogfighting. In general

once he's within range he'll slow down and adjust his speed to match yours, without ever letting it get so low as to stall. Providing

that you can avoid being shot down in the process, you should be able to force him to overtake by slowing down yourself. One word of warning though - in his rabid excitement to get to you he may continue flying straight on and embed himself in the back of you!

If all goes well you should see the enemy overshoot appearing in front of your HUD. If you've been on the ball the AIM-9s will be armed and humming and searching for something to mate with. Wait for the lock, then let one go. Scratch one enemy MIG!

1 The thing to do when confronting an enemy aircraft is to use all your available visual aids to the full, and that means the radar, the RWR and any significant HUD symbols. Here the enemy is approaching from behind so the first thing to do is try and reverse this situation. Use the outside views to accurately pinpoint just whereabouts he is and then formulate a plan of action, quickly! Checking the speed datum it's obvious that the plane is travelling much too fast. Slow down, using both the throttle and the air brakes until the aircraft symbol on the RWR starts to wind around in front of you



2 Slowing down, the enemy plane doesn't know what to do. I can reduce my speed to just above stalling, but because of the way in which the computer pilot flies, there is a built-in margin of safety that he will never exceed. It's this safety margin that you've got to exploit. Get the throttle and arm the cannon (at the close ranges that you'll be fighting at there will be little chance of getting a good enough lock to launch a missile), keeping an eye out for any missiles that he decides to launch at you



4 The gun radar has attained a lock but you've still got to get a clean shot in. Remember that the gun-site is intelligent, it predicts where your shots will hit if you fired the cannon at this exact moment. Don't aim for the aircraft targeted by the HUD, aim instead for the small cross visible a few inches ahead of it. This gives a predicted impact point and should ensure a kill

3 There he goes! The slowing down worked and now he's overshoot. The tricky part here is to get a radar lock on him so that the intelligent gun-sites becomes active, because without it you'll be very lucky to hit him with the iron sight. Wait until the radar lock appears at the bottom of the radar screen then lock on. It's now a case of turning with him wherever he goes so that you can get a clean shot in



5 Scratch one enemy MIG. It's tough keeping him in your sights, but if your speed is slow enough you'll be able to turn inside any manoeuvre that he makes. Also, don't forget to make use of the flaps and ailerons because these will also contribute greatly to any turning circle that you'll make

AIR-TO-AIR COMBAT IN THE LEAD SLED

The ADV Tornado wasn't designed as a fighter, it was intended for air defence. These two roles may sound similar, but a fighter plane is able to get up into the sky and battle with the best planes that the enemy can throw at it, whereas an air defence aircraft is only intended to fly CAP and try to deter any enemy invaders that violate friendly airspace.

When you're up there against things like MiG-29s and Su-27s, you will find that the difference between a fighter and an ADV becomes painfully apparent. This is why the air-to-air combat tactics that must be employed in the Tornado differ quite significantly from tactics that are generally accepted as 'standard'.

Of the three possible opponent aircraft, the Su-27 (Flanker) and MiG-29 (Fulcrum) are considerably superior in terms of G-limits and power, with a very similar roll rate as the Tornado. This makes them very difficult opponents to fly against because of the fast reactions of the computer pilot. The MiG-31 (Foxbat) on the other hand is inferior to the Tornado in G-limit and roll rate, but has the edge when it comes to power

and speed at altitude. You MAY be able to beat the Foxbat using standard ACMs, but it won't be easy. The other two are almost impossible to defeat on their own terms and in close combat, which is why you must use some of the Tornado's unique features to even out the balance.

WHAT TO DO WHEN THINGS GO WRONG...

Even the best laid plans can occasionally go wrong, and during air combat that could mean the difference between successfully completing the assigned mission and bailing out because of a careless mistake. If, after carrying out the manoeuvres outlined above the enemy still manages to evade you, don't give up there are still a few other things you can do to make sure of a kill.

You're now flying slower than he is willing to go, which means that you can turn faster and in a smaller radius than he can. To make the most of this speed difference it's important to make use of the high lift devices that are an integral part of the Tornado's flight equipment (the flaps and the slats). Make sure that

your wing configuration is correct (wings swept fully forward) before attempting to lower the flaps or else damage may occur to the wing, screwing up your chances of attaining a positional advantage. Turn to follow him, while dropping as much flap as your speed allows. As the speed starts to drop further, drop more flap until you are at full 'flaps down' configuration.

If you've played this series of manoeuvres correctly (and if lady luck happened to be smiling on you today), you should find yourself on his tail in a tight turn at about 200 knots with full flap and power. He'll now be pulling more Gs than you because he's flying faster, yet still trying to out-turn you. Use the advantage that you gained and turn inside to line up for either a cannon or missile kill.

The trickiest part of this exercise is attempting to stay inside the flap limiting speeds. You must keep the throttle up to maximum to sustain your rate of turn, but all the while be aware that if you go too fast you'll end up ripping the flaps right off and lose control. It's a delicate balancing act that requires absolute control and knowledge of the aircraft systems, and more than a little homework regarding the flap speeds.

PLAYERS GUIDE

AIR-TO-GROUND THREATS - KEEPING THE TORNADO FLYING

Air-to-ground threats can be divided into two categories - those that can be ignored and those that will illicit a defensive response from you. The following group of tips should help you to make up your mind about which ones to ignore and which ones to take seriously.

THREATS YOU CAN AFFORD TO IGNORE

By keeping a careful eye on the RWR you can judge whether a threat is going to present a problem. An AAA or SAM symbol may appear on the screen, but the important factor in deciding whether to ignore or defend against it is where it appears on the display.

If a symbol pops up within the quadrant (that is the quarter circle displayed on the RWR) and it's centred on your nose, then it's a threat worth worrying about. Anything which appears outside that angle is well off to the side and is not worth worrying about. From that kind of angle you are definitely safe from AAA and even a SAM would have great difficulty in achieving the kind of velocity to catch you up, especially if it's launched from behind you.

COPING WITH ANTI-AIRCRAFT ARTILLERY

So what exactly do you do if a friendly AA battery decides to take pot-shots at you? The first thing to do is not panic. AA fire is radar predicted, which means that a radar tracks your aircraft, passes the information onto a fire control computer and then the guns fire where they think you will be by the time the shell arrives.

As there is no permanent lock you can dodge the shells already in the air and confuse the fire control computer by manoeuvring, so long as you are not travelling directly towards or away from them and providing that the range is not too short.

If you're on an attack approach and the flak starts to fly, you'll want to dodge, but no so much that you lose the target altogether. If the aircraft is terrain following in AFDS track mode (which it normally should be), the solution is to pitch the nose up and down by jiggling the ride-height setting up and down between 200 and 300 feet. Just try to make sure that at the moment of the weapons' release there is no pitch changing, as this will degrade the weapons' accuracy.

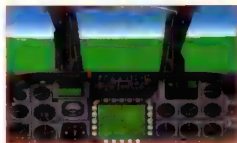
Flying at night is the usual way to avoid detection and ensure a larger margin of safety for the aircraft, but in Tornado this presents just as many problems as daylight attacks. For a start, to

navigate and target at night you'll need to use the radar more than is usual, which means that the enemy will still see you coming a mile off due to your radar emissions. The thing to remember here is to

stay low and hug the earth. Flying between hills is an effective way to shield yourself from unwanted enemy interest, as is dropping occasional flares and chaff to omit false radar returns.



This is what a direct hit looks like from the outside. Luckily, no damage has been sustained and it should be possible for the rest of the mission to continue as planned.

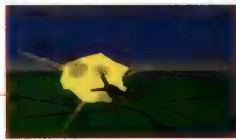


Pay careful attention to the RWR receiver as the only warning that you'll get of impending AA fire (other than the shells exploding just in front of your cockpit) will come from this instrument. The threats that are displayed at the moment should be taken in all seriousness. They are directly in front of your aircraft and any shells or missiles launched now will have a high chance of striking home. Drop copious amounts of flares and dodge hard to avoid the AA fire and SAM missiles.

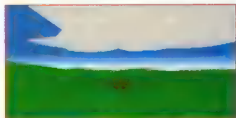
At this particular point in time there are three or four SAM sites locked onto me and launching missiles. If I stay at this height then I'll have no chance - the only solution is to get down lower and use ECM and defence pods (chaff and flares). By making use in the outside views it is sometimes easier to see incoming missiles, and it gives you a better idea of their true position relative to yours, including that all-important statistic - missile range.

REAL THREATS - THE SOLUTION

An AAA battery has locked onto you and opened fire. From this distance you should be able to swerve and avoid any of the shells that are being launched at you with relative ease, although should you stray too far and encounter a mobile SAM launcher then your problems are going to get a lot tougher.



An effective method of avoiding enemy EWR is to use terrain masking effectively. The Tornado world is tailor-made for this method, featuring hills and valleys as it does. When planning your mission take notice of all the terrain features that surround the target, both on the ingress and the egress (to and from the missile area). If you know there's a lot of AAA activity nearby, then use any available ground cover to make the job of tracking you that much harder. The enemy EWR works on a line of sight principle, so if it can't see you, he can't track you.



SAM SITE ERADICATION

SAMs at low level can prove to be more of an occupational hazard than a real threat, so long as you keep a picture in your mind of where the threats are. Learn to differentiate between which threats are a real danger and which are just a nuisance. A SAM coming in at low

level can usually be defeated by maintaining a high speed (which the IDS Tornado is designed for) and pumping out flares at about two-second intervals. The main problem here will be running out of flares, so don't waste them. Anything that is launched at a very close range is unlikely to get you, it will more often than not fly straight over your head.

[illegible]

ENGAGING THE EMPIRE IS NO EASY FEAT, ESPECIALLY
THE STAR DESTROYERS AND THE AWESOME DEATH
STAR. PC PLAYER GUIDES ROOKIE REBELS IN THE
RIGHT DIRECTION...

ISSUING ORDERS

Once you've engaged a target, stay on him until he's destroyed. Stick to this rule otherwise he'll turn in behind you and attack while your attention is elsewhere. Also, remember to use your wingman. I find the best method of employing wingmen is to locate the first target, order your partner to attack and then pick the next starfighter for myself.

Apart from the attack order, use all other commands with caution. For instance, **never use the 'Wait for further orders' command** because this will make your wingman a sitting duck. Don't bother using the commands 'Ignore target' and 'Cover me' because your wingman will break off his attack, allowing the TIE fighters to engage. As for 'Head for home', use when all the enemies have been blasted.

WEAPONS

Concussion missiles and proton torpedoes will home in on large craft five or less clicks (Ks) away, but will only target smaller fighters when you get within 2Ks. Also, the closer you are, the easier it is to get a positive lock.

Unless the rapid destruction of the target is of vital importance, is a large cruiser, or you're engaging an assault gunboat or something larger, try to use laser cannons. **Although not as rapid firing, the dual shot can take out TIE fighters in a single blast** and there's a higher chance of actually hitting the enemy.



ENERGY CONFIGURATIONS

The following configurations will allow you to get the most from your starfighter:

NORMAL
LASERS: 50 PER CENT
SHIELDS: 50 PER CENT
THROTTLE: FULL

The 'normal' setting is the default mode which your fighter will start with. It's ideal for non-threat environments and occasionally dogfights, providing shield levels have been previously charged. To alter the normal mode to something a little more aggressive, set the lasers to maximum capacity. This setting is perfect for most dogfights.

SPEED
LASERS: 0
SHIELDS: 0
THROTTLE: FULL

Getting the most out of your starfighter in terms of speed will slowly drain the shield and laser stores, so keep a constant eye on the respective energy levels. **Use the speed setting when closing in on targets and even on tougher missions like the trench run.** Again, if you want something more aggressive but still wish to maintain high speed, switch the lasers to 100 per cent recharge. This will allow you to easily engage the faster TIEs, but remember to keep your shields raised – energy will have to be frequently transferred from the cannons.

SLOW ATTACK
LASERS: 100 PER CENT
SHIELDS: 100 PER CENT
THROTTLE: 2/3 TO FULL

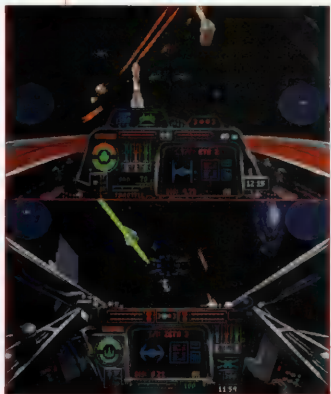
Against the slower enemies it's probably better to sacrifice velocity for stronger shields and cannons. You'll have to adjust your speed as necessary, so you can stay just behind your target rather than lagging behind or over-shooting.

X WING

PERHAPS

the best advice I can give is to use your scanner – constantly. Most of the Empire's fighters are extremely fast and agile so the only way to lock on is by glancing at the radar, bringing them round in front of you and then engaging. If you lose them, which is a fairly regular occurrence, go back to the scanner and start tracking again.

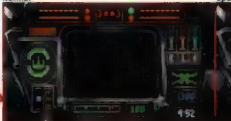
Another point to remember is to **keep your shields evenly balanced.** After sustaining a hit, your shields will obviously be depleted. To even them up between the front and the rear, **tap the 'S' key three times.** However, it's a good idea to redirect all shields to the front in a head-on pass just in case the enemy decides to ram.



Normal

Speed

Slow attack



ENGAGING THE ENEMY

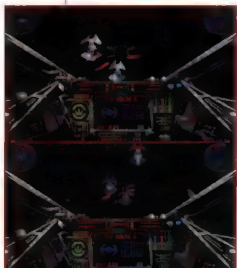


TIE FIGHTER

TIE fighters are extremely tricky, sacrificing armour and shields for sheer speed and agility. This makes them very hard to track and almost impossible to destroy with concussion missiles or proton torpedoes. **Use the cannons on single-fire mode when piloting both the A and Y-Wings**, but use the dual fire configuration in the X-Wing – you therefore have twice as much chance of hitting, although 50 per cent of the shots will miss. Incidentally, the TIE fighter's wingspan is less than that of an X-Wing so the wing-tip lasers will fire around the TIE if you're too close! Another thing to remember is that the pilots have been ordered to take their own lives if necessary, ramming the more valuable rebel fighters in suicide head-on attacks.

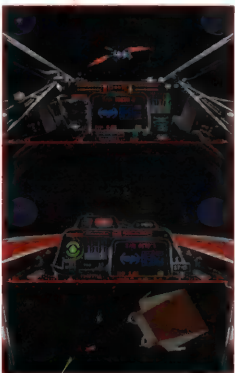
TIE INTERCEPTOR

The Imperial interceptors are basically the same as the standard TIE fighter, but take four laser hits to destroy rather than two. As they're slightly faster too, it may be worthwhile using a missile to take them out. Otherwise use the same tactics for the TIE fighter.



TIE ADVANCED

My advice for attacking the TIE Advanced (TA)? To be quite honest, you don't really need to. You'll only encounter the TA on the Death Star trench run, where it starts about 17Ks away. If you quickly descend into the trench, Darth won't even get a shot in. If you decide to take on the dreaded TA, take care because it's the deadliest fighter the Empire boasts, encasing its pilot in a shell of fast-recharging shields. **Set your laser configuration to quad-linked because this increases the chance you have of hitting your target and does more damage per hit.**



CORVETTE



TIE BOMBER

TIE bombers are slower than the basic TIE, but carry concussion missiles which prove deadly in combat. Set your speed to equal the bombers, which is usually around two-thirds power depending on which ship you're piloting. In escort or protection missions it may be necessary to fire a single torpedo to destroy the bomber before it fires its missiles – do this if its out of range of your lasers. **The bombers take six laser hits to destroy and because they are slower, it makes them easier to track.** Select dual fire and make every shot count. Watch out for the concussion missile fire.

When the bombers attempt to lock on to your ship, the cockpit indicator will flash (check the reference card for each fighter's cockpit layout). This gauge will also indicate when a ship has acquired a positive lock. If this happens you have two options: either target the incoming missiles or execute evasive manoeuvring. Choose the first and highlight the missile with your targeting computer. Turn around to face the missile and attack with either lasers or missiles – missiles are particularly effective because of their speed.

If you decide to run, open up the throttle and pull diagonally back on the stick. Keep an eye on the scanner – the missile is the blip that's traveling very quickly! When the missile nears, yank the joystick into the other bottom corner. Continue to do this until the lock indicator clears. As a precaution, direct the shields to either the front or the back, depending on the direction in which the missile is flying.

If flying with a wingman, get him to attack the same corvette target as you. **Select dual-fire torpedoes and launch them as soon as you can.** Close in to finish off with lasers, attacking from the corvette's blind spot which is just behind the rear engines. Jink and weave all the time, otherwise you'll be ripped apart from the constant hail of laser fire. ➤





FREIGHTER

Like the cargo container, the bulk freighter takes a hell of a lot of hits before it explodes – over a hundred laser blasts to be exact! Switch to quad fire for speed. Alternatively use 12 missiles or six proton torpedoes.

SPACE TUG

The space tugs chug around space, pulling damaged cruisers so they shouldn't cause much of a threat. **They don't use shields and a single laser blast will send them spiralling out of control across the galaxy.**

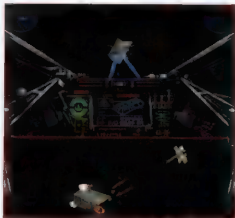
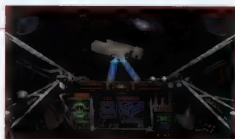
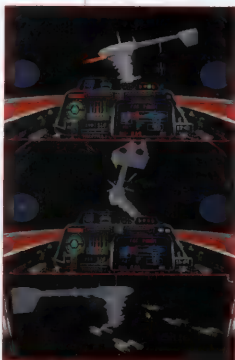
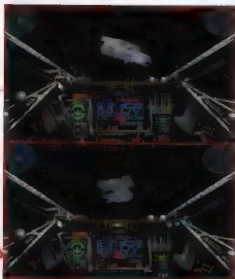
ASSAULT GUNBOAT

► Drop your speed to two-thirds power and maximise shields. Select concussion missiles or proton torpedoes and wait for a positive lock. **Usually two torpedoes will take a gunship out, or five missiles.** However, I prefer to weaken them with a couple of missiles then close in and finish them off with dual-linked lasers. This is relatively easy because of their slow speed.

TRANSPORTER

The transporters are weak compared to the more heavily armed freighters but still take about 25 direct hits to **destroy**. Two torpedoes or five missiles do the job just as well – link them together for effectiveness.

Remember, craft like the transporter, freighter and cargo container don't actually pose a threat themselves, but are instead protected by TIE patrols or even mines. Take care of these before attacking the containers.



CARGO CONTAINER

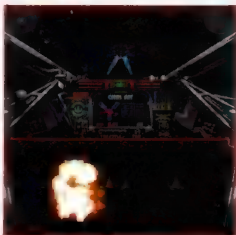
There's not really that much I can say about eliminating a cargo container apart from it takes a massive 48 laser hits to destroy, or alternatively 12 missiles or six torpedoes!

FRIGATE

There's no way you'll take out a frigate on your own, so don't even bother to try! Instead, the rebels will try to capture the frigates, seating you in an A-Wing to head the attack. **The first problem you'll encounter is obviously the TIE patrol which you should target and hopefully destroy first.** If you fail, the TIE will close in on the Y-Wings which are concentrated on the frigate. With the TIE wiped out, head for the mines which surround your primary objective. Take these out with lasers. Apart from the initial wave of TIE fighters, the frigate Priam will launch two bombers, one after the other. Use your missiles to take these out quickly, then charge your shields before bearing around to target the frigate itself. Unleash all the remaining missiles (dual fire) to help the Y-Wings reduce their shields. Switch over to cannons and keep attacking aggressively until the Y-Wings disable the frigate with their ion cannons. Circle the area while the boarding crew closes in, taking out any stray TIEs that appear on your targeting computer.

MINES

For a higher chance of destroying mines at long range, link the lasers together. Otherwise leave the cannons on solo fire because the mines explode after a single direct hit. To be honest, the mines aren't much of a problem if you keep your distance. It's the other ships that surround them, causing you to make a mistake and fly too close.



COM SATELLITES

Ignore everything else in the area, just head towards the satellite. Charge shields up to maximum, then switch the power over to engines. Do the same with the lasers. Head straight towards the satellites, weaving and dodging all the time. Select dual torpedoes, wait until you get within 4Ks or less, then aim. Fire as soon as you get a positive lock, then turn around and hyper out of there!

STAR DESTROYER

Star Destroyers (SD) are extremely difficult to eliminate with only a few weak spots to aim for. You need to get in close as fast as possible, so charge up your shields to full, then switch the power over to throttle. Engage any TIEs that fly across your path, but concentrate on the SD. Switch over to dual torpedoes and head towards the bridge and the two round shield generators on top. Try and attack the bridge from the side so the two generators can be lined up and attacked in a single pass.

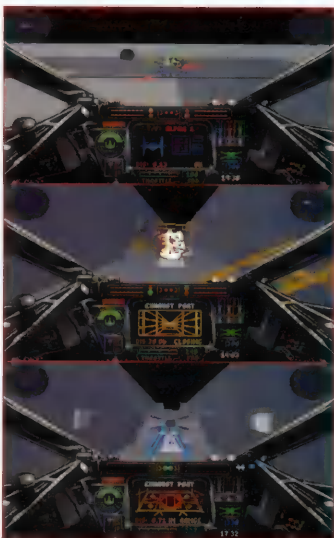
Approaching 2Ks, the Star Destroyer will open up with laser batteries so jink to dodge as much fire as possible. Position the cross-hairs carefully because the missiles will not lock onto a specific section of the destroyer. Fire off two missiles, pull round to face the next generator, aim carefully and launch another two. The four torpedoes should rip apart the power domes, leaving the SD without shields (check your targeting computer).

Without shields, the SD can be reduced to a ball of flame by flying underneath the ship and attacking the reactor dome towards the back. Use torpedoes if you've got them, otherwise switch the cannons on to quad-link and fire. Remember, you won't be attacking the SD on your own so use your wingmen wisely.

DEATH STAR SURFACE

The hangar bays that need to be eliminated are patrolled by TIEs, so flick through the various bays and log them into the targeting computer for later use. Attack the invading TIE bombers while your wingman attacks the hangar bays or vice versa. Concentrate on taking out the hangars first, effectively stopping the Death Star from launching more. The bays are tough, so use dual-fire torpedoes and finish it off with cannon fire. This makes the last bay extremely difficult because all the torpedoes will have been launched. Shift the shields to the rear to protect your backside from the attacking TIEs, then balance the deflectors and mop up the remaining fighters. Now head towards the nav buoy.

The nav buoy hovers approximately 2Ks above the Death Star surface and is surrounded by gun towers. Carefully take the laser batteries out first, assigning targets for your wingman if he's still around. With the area safe and secure, turn your attention to the nav buoy. Reduce speed, set lasers to quad-fire and attack.

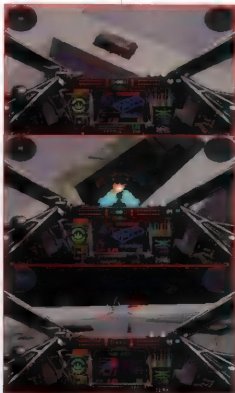


TRENCH RUN

As you approach the trench, three TIE fighters will rise from the surface and attack head on. Maximise shields and deflect to the front, then take them out with dual cannons. Balance out the shields by tapping 'S' three times, target the next set of fighters and engage, trying to stay as close to the trench as possible. The pilots are extremely skilful and take a while to destroy. By the time all three have been shot down, the TA will be in the area. Ignore this new threat and head for the trench at full speed. Charge shields to maximum then redirect them to the front. Set the laser charge rate to 100 per cent and fly towards the exhaust port.

The trench is lined with gun emplacements, but I found the best method was to dodge their shots as much as possible – concentrate on taking them out and you may accidentally fly into the trench wall. You won't be firing your lasers, so channel all power to shield until you reach the exhaust port. Switch to torpedoes and aim carefully for the port. Wait until the last moment, fire, then pull up out of the trench. If you hit, a message will appear at the bottom of the screen. Balance your shields and get outta there! If you missed, head for home and try again.

Another piece of advice worth noting is that it's easier doing the trench run with two people – one player recharges the forward shields while the other simply controls the ship.



PLAYERS' GUIDE



ALONE IN THE DARK 2

THINGS GO BUMP IN THE NIGHT AGAIN AS

by

INFOGRADES STANDS

Alex

ALONE IN THE DARK FOR

Stimmons

THE SECOND TIME.

MEMORIES of cherry pie, hot black coffee and, gulp, Shenlyn Fenn came flooding back when I first saw Alone in the Dark 2. Not just because I'd like to be alone in the dark with the delectable Ms Fenn though, but because the bad guy in the game is called One-Eyed Jack – this also happens to be the name of the casino/brothel in David Lynch's surreal soap, Twin Peaks. Jack, the card-playing pirate and not the gambling hall, is the evil bloke who, while being blind in one eye, has the gift of a seventh sense which guides him to where all the booty is. If only Blackbeard had the same skill, life would have been so much easier.

Edward Carnby, the supernatural

PRODUCT

Alone in the Dark 2

SOFTWARE HOUSE

Infogrames

RELEASE DATE

November

REQUIREMENTS

Dos 5.0 Min, 2Mb Ram, 386, VGA/MCGA

SUPPORTS

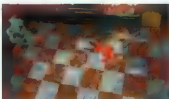
Soundblaster, Sound Master 2, AdLib, Sound Source, Thunderboard and Pro Audio Spectrum, Joystick

Carnby has flown out to the States to aid an old buddy who was kidnapped by One-Eyed Jack and his gang as he attempted to rescue a young girl. Just what all this means I don't know, but it happens to fall smack-bang in the middle of the Christmas holidays. Forget brandy, Christmas pud and Santa's grotto, Edward is going to Hell's Kitchen and back before he can open his presents.

Alone in the Dark 2 initially looks identical to the first game as you guide a polygon Edward around a maze of beautifully drawn backdrops which are haunted by foul creatures of the night (or something like that). Rather than simply rehashing the original game with a new story-line however, Infogrames has

private eye is back once again on the case as spooks and spectres raise hell in early twentieth century California.

One-Eyed Jack's house, coolly named Hell's Kitchen, is quite large and will take some 50 hours to explore. How we see Ed looking down the toilet for any gruesome ghouts. Get the Toilet Duck, Carnby!



Ed's taken one too many bullets to the skull and passed out on the floor. Don't worry, a couple of aspirins and a good night's sleep and he'll be all right



More gun-toting gangsters lurk in the hallway blowing holes in the walls... unless Ed gets in the way. Nip down the stairs and out of the bad guy's reach



Oh! Ed has been caught in the cross-fire between two homicidal gangsters and a zombie carrying a machine-gun! Either get out of their quickly, or duck!

PRE VIEW



actually sat down, noted the faults from the first games and done its best to correct them. The result is a far bigger game with improved graphics, control system – and surprisingly complex puzzles. According to Infogrames, the evil creatures in the game are “characters no one in their right mind would trust with children. These are evil men who, judging by their pallid complexions, should have been dead and buried long ago”. Hmm, remind you of any bad pop stars?

For those unfamiliar with Alone in the Dark, the player has complete control over Edward who can pick up objects and interact with them. Guns and weapons are primarily the source of fun and the only way of protecting yourself against attack – knives and daggers are pathetic compared to the power of a Tommy gun which rips the ghouls to shreds.

Don't count on beating the zombies that easily because they can fight dirty as well with swords and revolvers being just some of the weapons that are



outfit, complete with fluffy white beard, in order to fool the beasts and enable you to walk safely around One-Eyed Jack's lair.

As in the original, each room is

“ACCORDING TO INFOGRAMS, THE EVIL CREATURES IN THE GAME ARE ‘CHARACTERS NO ONE IN THEIR RIGHT MIND WOULD TRUST WITH CHILDREN. THESE ARE EVIL MEN WHO, JUDGING BY THEIR PALLID COMPLEXIONS, SHOULD HAVE BEEN DEAD AND BURIED LONG AGO’. HMM, REMIND YOU OF ANY BAD POP STARS?”

carried. You find yourself dodging the gunfire to survive, although there is an easier way of dodging the fiak. Remember, it's Christmas and what does everyone love to see in this joyous season? Santa Claus of course. Yep, Edward can slip on a Father Christmas

viewed from a number of different camera angles which automatically change as you move around. This allows Edward to see inside every nook and cranny, which often hide objects vital for eliminating Jack. All the 3D animations are calculated in real-time,

“Oi, gey, fancy shootin' some pool for a little bet?”
“Nah, but you don't half look cute in that Santa outfit. C'more!”

but the game will run at the same speed on any machine. However, a fast machine will use more frames of animation and therefore appear smoother. On the whole, Alone in the Dark 2 runs a massive four times faster than the first game but still boasts over 50 hours of game time – and that's if you're good.

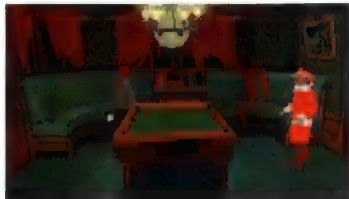
Alone in the Dark 2 is currently undergoing testing but, depending on any unforeseen hold-ups, PC Player should be able to get the finished product within the next couple of months. Keep your eyes peeled for a full in-depth review. ■



Pack the Band-Aid because Ed gets shot with alarming regularity



Zombies, zombies everywhere. Behind the couch, under the stairs



Uh-oh, cornered. With nowhere else to run it's time to look through the inventory, pull out the biggest stick you can find and hit that beast around the head

The spacecraft have all been snazzed up with new texture-mapped polygons and fancy shading techniques

FRONTIER ELITE II

FIVE YEARS ON, AND THE LEGEND FINALLY
CONTINUES. CAN THE MAGIC OF ELITE STILL
CAPTURE EVERYONE'S IMAGINATION?



Actual: 2222.7 kmh⁻¹ Set: 2280.5 kmh⁻¹

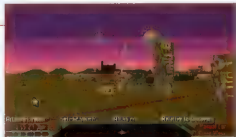
Relative to: Merlin



Move into orbit around a planet and Elite II manages to portray a wonderful impression of scale. The planets actually seem as though they're enormous



At a galactic level there is still more detail. The starscapes are far more realistic and planets have a particularly solid look about them



If you go down to a planet's surface, the graphics are possibly more detailed than those of many of the latest flight sims

THERE can be absolutely no denying that the original Elite is one of the most widely respected games ever developed. Talk to anyone who played it on the Beeb or the Commodore 64 and you'll be surprised at just how fanatical many of its fans are. A few years after the original 8-bit version was released, the PC was blessed with a slightly enhanced version, Elite Plus. This new game had filled polygon graphics and moved a bit quicker, but was basically

How can the original possibly be expanded upon though? Is it possible to improve on any aspect of it apart from the presentation? The new game has been designed to 'feel' very much the same as the first, but there are a number of important new features. The first and most obvious is that the graphics have been snazzed up enormously. The polygons are now far more detailed and have bit-mapped images pasted onto all sides to produce

**"TO SEEK OUT NEW LIFE AND NEW CIVILISATIONS.
TO BOLDLY GO WHERE NO ONE HAS GONE BEFORE"**

the same game. Since then there have been numerous rumours circulating regarding a possible sequel and we've been hearing stories of an imminent release of one for well over a year now. Well, at last it's here. Developed by the same team as the first game, Frontier: Elite II has been in development for five years and is now just about ready for launch.

a more realistic look – for example, ships have all sorts of recognisable bits hanging off them including weapons and landing gear.

Next is the fact that we now have planets...and lots of them. Rather than simply hopping from space station to space station, you can now travel to a planet's surface to seek trade and adventure. Check out the shots we

PRODUCT

Frontier: Elite II

SOFTWARE HOUSE

Gametek

RELEASE DATE

November

REQUIREMENTS

Dos 5.0 Min, 2Mb Ram, 386, VGA

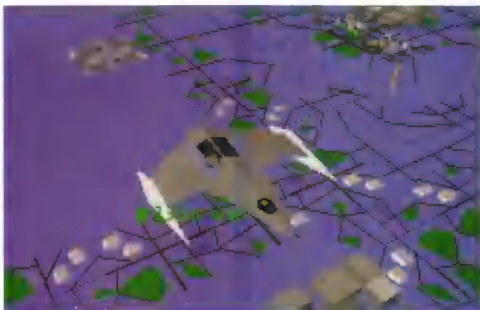
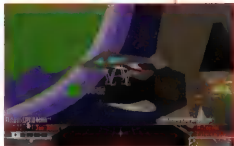
SUPPORTS

Joystick, Soundblaster, Adlib, Roland sound cards

**PRE
VIEW**

The space stations have come on a long way, don't you think? Gone are the days of the rotating wire-frame images, now we have huge texture-mapped behemoths which vary from sector to sector.

The docking sequences are considerably more impressive now. Will we still get the Blue Danube in the background?



The planet surfaces are literally riddled with detail – more in closer and the effect is reminiscent of the Mercenary series of games

have here and I'm sure you'll agree that the amount of detail is quite incredible, especially when you consider that the game incorporates over 100 star systems each containing habitable planets with varying degrees of infrastructure!

The implementation of the star systems is yet another aspect of Frontier which is particularly gob-smacking. You see, they're not just a random collection of planets spinning around different stars, they're accurately modelled systems based on true astronomical charts. Pretty amazing, huh? If you think about the amount of detail we have here, it's absolutely phenomenal. Apparently the development team are all astronomy buffs, and one of their ambitions has been to create an accurate simulation of space. Looks like they've managed quite well.

Is the story any different though? Those of you with an encyclopaedic knowledge of the original will no doubt be itching to find out what happens in Frontier. For starters, Elite II is set in the year 3200AD and the human race has now spread throughout the galaxy and is still exploring new systems. Thousands of worlds have been settled but mankind is on a continuing mission to seek out new life and civilisations. To boldly go where no one has gone before... Hang on, that's something else I'm thinking of, but you get the picture.

The game begins with you in possession of a very small and crappy little spaceship which has been left to you by your grandfather (that was your role in the original game). From here, the possibilities are limitless. As with the original you can choose your fate and follow pretty much any career that a

modern 33rd century social structure offers. You can join the militia and work your way up the ranks, you can take to trading, smuggling or even piracy – you choose. There are loads of ships to play around with, an enormous number of weapons to fiddle with and countless commodities to deal in.

At present everything is finished apart from the sound. As I write this the music is being composed and generated along with a number of new sound effects. All graphics, 3D models and astronomical details have been completed and it's just a case of everything being bolted together. After all this time, one of the most eagerly awaited sequels is finally ready.

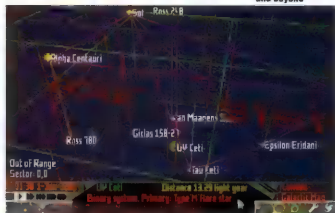
As a final note just in case you're curious – yes, the combat rating system is the same as in the original. Start life at the bottom of the heap and work your way all the way up to Elite. Ooh, the nostalgia of it all. How can you possibly wait until next month when we'll have a massive six-page review of the thing? ■



The level of detail found on the planet surfaces is very much like that which you'd expect to find in a flight sim



The galactic map represents the whole of the core systems, ranging from our own system, past Alpha Centauri and beyond



Although the graphics appear quite chunky compared to many of the latest sims, one advantage that Frontier has is that the movement is very fast, fluid and smooth



**PRE
VIEW**

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REASONS to be cheerful? I read a posting on a certain well-known and expensive BBS the other day – a cri de coeur from a computer war gamer which summed up the frustration many of a similar disposition are experiencing. It went something like, “Gee, who decides what games to publish anyway, the programmers or the accountants?”

My initial reaction was not assertively in agreement, until I realised that I was exhibiting the same pitiful naïveté as ‘Frustrated of Philadelphia’. The fact is that the computer game business is demand led, but the perception of demand is extremely conservative. Companies tend to stick with a safe formula once the motherlode uncovered by some programmer or designer’s flash of inspiration has been plundered. Like many an avid war gamer, I tend to get bored by the umpteenth regurgitation of ‘Hitler Strikes East/West’ (delete as appropriate). I’m sure many share my own eclectic taste which spans thousands of years of military history. I find it as challenging to attempt a repeat of ‘Alexander Takes on Hoards of Naughty Persians and Wins’ as I do to tread the muddy bogs of Belgium or the sands of Cyrenaica.

However, if you like your war games electronic, and being a lazy person by nature I do, you could be forgiven for thinking that military history began in 1941 and ended in 1945. This is a simple reflection of the sales potential of the US war gamer, who is believed (by the accountants) to be solely interested in WWII (post Pearl Harbour) and incapable of generating interest for other more esoteric periods.

This leads on to the fundamental question – who decides what games to produce, and why? Publishers such as Three Sixty and, if the PR is to be believed, Avalon Hill, are committed to producing war games that are challenging, well researched and graphically rich. However, even they are constrained by their bank balances to try to produce conflict simulation software with as broad an appeal as possible. This has manifested itself in the form of glossy graphics – much as I applaud the effort spent on the front end

ANGRY

BY STEPHEN HARPER

constrained by what the market will go for, based on how certain designs have performed sales-wise previously.

There is an old military maxim that runs something like ‘Don’t use the lessons of the last war to fight the next’. Instead of seeing original games bursting onto the scene with refreshing new ideas and different outlooks, we have become accustomed to a very gradual and slow evolution of ideas into commercially safe categories.

I started by saying that I was a war gamer, but I also fly F-16s, build cities, explore strange new worlds and do all

financial rug was pulled from under their feet before it was finished. The game ended up being hopelessly slow, with an IQ somewhere on the evolutionary path between wolverines and Neanderthal man.

The same could be said of Flight Sim V. The anticipation for this title reached near-hysterical proportions, based on the assumption that Flight Sim IV was four years old so the new one must be that much better. Nice idea, except that it ignores the financial imperative that dictated the degree of programming effort and testing that

“WERE MORE EMPHASIS PLACED ON CUTTING-EDGE DESIGN RATHER THAN ON WRITING TO A FORMULA, I BELIEVE THAT GAMERS WOULD BE AS ENGAGED BY GAMES NOW AS THEY WERE ONCE BY THE FRESH IDEAS WE SAW DURING THE EARLY YEARS OF THE HOBBY”

other manner of bizarre things that enable one to suspend one’s disbelief in order to be entertained. All of these genres suffer from the same malaise – the closing of new ideas into a rigid framework which doesn’t require a great deal of artistic innovation, but is sure to garner sufficient cash to enable the continued employment of the increasing numbers of people (including accountants) that live off the industry. This is most easily observed in the numbers of titles that, like movies, attempt to repeat the appeal of the original by using the same title and appending the number. Harpoon II, Ultima VII, Falcon 3, Death Wish 128 – it’s a tried and tested formula that guarantees a certain paycheck while giving the impression of progress.

No doubt there are those who would argue that the games I mentioned were, or will be, excellent entertainment and value for money. However, I wonder how many other games never saw the light of day, games that might have

would be lavished on the product. Players were looking forward to experiencing a ground-breaking simulation with the ultimate in realistic flight models, interactive air traffic, realistic instrumentation and plain old innovation, but what they actually got was fancy graphics and a flight model straight out of a Nintendo game.

Worse instances of this ‘safely first’ policy are also visible, check out QOP’s ‘WWII Battles of the South Pacific’. Compare and contrast this with the old Gary Grigsby SSI game, ‘War in the South Pacific’. They are so similar as to be virtually identical. I suspect that the computer software industry is dying, although it is difficult to tell how ill the patient is.

Is the illness terminal? Well, I suspect that it probably is, but I lament because I don’t think it need be so. Were more emphasis placed on cutting-edge design rather than on writing to a formula, I believe that gamers would be as engaged by games now as they were once by the fresh ideas we saw during the early years of the hobby in the ‘80s. I welcomed Tornado, even though aspects of the design were flawed, because it was the first sim to model ground attack. If ever a program was graphically challenged, it was Action Stations, but it’s a fantastic game because it took a serious subject and gave it an in-depth treatment.

In other words, it is possible to produce stuff with new ideas, new angles and yet still appeal AND make money for the financiers. I’d like to see a tactical Napoleonic game done PROPERLY, I’d like to see a flight sim that made an attempt to model peripheral vision. It doesn’t take much to come up with entertainment software with new ideas, it just needs a bit of commitment to take a risk.

“THIS LEADS ON TO THE FUNDAMENTAL QUESTION – WHO DECIDES WHAT GAMES TO PRODUCE, AND WHY?”

of the V for Victory series, I think most purchasers would have appreciated more effort being put into the computer’s AI rather than what appears to have been spent on the graphics.

However, this is not a diatribe along the lines of ‘let’s have more realistic war games and less of the fancy graphics’. The point is that producing such ‘eye candy’ is a bit of a cop out, in that it ensures sales based on the buyers’ first impression. Sales potential has been allowed to influence the design to such a degree that it has suppressed the artistic and imaginative ability of the designer/programmer. This leads to a conclusion that game companies are

been more entertaining, original and challenging, because financial advice dictated that effort was channelled into ‘safer’ ideas. Every so often something new and fresh breaks through – Sim City was the last one that springs to mind. But guess what’s just around the corner? Sim City 2000 – COME ON DOWN!!!

Other games do attempt to break new ground. I hated Fields of Glory, not because of what it was but because of what it could have been. Clearly those responsible for it were in love with the period and the efforts they lavished on the chrome are highly commendable, but the game was stillborn because the

Stephen Harper opened Strategic Plus Software in 1985. Specialising in the more serious side of PC software, he is a dedicated gaming nut, with an aversion to anything that involves space invaders or platforms. The mail-order branch of SPS opened in 1988, and is doing very nicely, thank you!

Stephen can be reached at: Strategic Plus Software, 28 D&E The Courtyard, High Street, Hapton Hill, Middlesex, TW12 1PD. Tel: 061 877 8088 or drop him a line on Compuserve 081 5396783 STRAT PLUS, giving the ID number 100014, 3468.

**COL
UMN**

A NEW SIERRA SERIES IS BORN. WILL

IT MATCH UP TO THE FIRM'S

PREVIOUS CLASSICS?

GABRIEL KNIGHT

SINS OF THE FATHER

PRODUCT

Gabriel Knight: Sins of the Father

SOFTWARE HOUSE

Sierra

RELEASE DATE

November

REQUIREMENTSDos 5.0 Min, 2Mb Ram, 386SX, VGA, Mouse,
10Mb Hard Disk**SUPPORTS**

Soundblaster, Adlib

IT'S always a pleasure to take a look at a new idea from Sierra On Line. With the Kings Quest and Space Quest adventures already established as some of the most revered games in PC history, and Leisure Suit Larry developing such a reputation that his latest adventure (number six, which will be featured in next issue) is to be covered in both Penthouse and Forum magazines, we were very enthusiastic about being introduced to Sierra's latest character.

Enter lovable rogue Gabriel Knight, successful horror writer, bookshop proprietor and rookie private investigator. Described as having "rakish good looks" (he's a computer character for gawdsakes), Gabriel is one of those mysterious chaps who is

plagued by his past and cursed with a destiny — a bit like Batman but without the rubber fetish.

His first adventure introduces us to this latest hero, thrusting the player into what Sierra describes as a Neo-Gothic arena. Set in New Orleans in an unspecified time, the game draws on a rich variety of sources to create a dark and foreboding atmosphere. All this Gothic renaissance stuff is getting to be a bit trendy these days really, isn't it? Since Tim Burton brought the darker

generate an adventure game which is very much aimed at 'mature' players. Gabriel finds himself placed in some distinctly dodgy scenarios and has to react to all kinds of unusual behaviour! Dubbed the 'Shadow Hunter' by the powers that be, his adventure not only covers the investigation he is involved in, but also his dealings with the spirits that haunt his nightmares.

The game is presented very much in the style of the best graphic novels (the artwork looks absolutely superb

"GABRIEL KNIGHT FOCUSES SQUARELY ON CREATING A DARK ATMOSPHERE BY DRAWING ON VODOODO INFLUENCES AND NIGHTMARE IMAGES"

side of the Dark Knight to the silver screen and Francis Ford Coppola spruced up (to the point where it only vaguely resembled the original) Dracula, we've been seeing all sorts of moody stuff knocking about, with a large dose of cyberpunk thrown in for good measure.

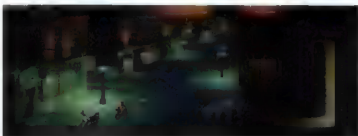
Gabriel Knight draws on voodoo influences and nightmare images to

throughout), and Sierra fans will be pleased to hear that it has been developed by Jane Jensen, the co-author of Kings Quest VI.

The screen shots we have here are only from very early on in the game's development, but all being well a complete version of the game will be ready for review in time for issue two of PC Player.



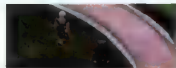
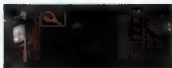
The animation of all the characters is far more realistic than in any other Sierra game. Each personality looks and behaves in a different way



The introduction to the game sets the scene very well. It not only looks very nice, but it also makes use of some very convincing sampled sound



Gabriel's bookshop is a good example of how detailed the graphics are throughout the game. Many of the scenes are filled with useful objects and information



PREVIEW

This whole icon bar only drops down when you need to use the functions which it allows

The Use Icons, which include picking up, operating, opening and using objects

Gabriel — complete with floppy hairdo



The pouch contains your inventory, whilst the tape recorder holds a record of all the conversations you've had in the game

The more interactive functions are handled from here. You can interrogate, make small talk, examine or simply move around using these

Characters can be spoken to by simply clicking on them. Some will be eager for a chat, whilst others will simply dismiss you

BENEATH A STEEL SKY

A BRITISH DEVELOPED
ADVENTURE TO CHALLENGE THE
MIGHT OF LUCASARTS? VIRGIN
HAS HIGH HOPES FOR ITS NEW
CYBERPUNK ADVENTURE.

DUBBED

as the world's very first computer-based animated comic book adventure, Beneath a Steel Sky combines the talents of famed graphic novelist Dave Gibbons with UK-based development team Revolution Software. By working together, the team has created a game which not only illustrates the style of Gibbons, made famous through his Watchmen and 2000AD work, but also showcases the latest incarnation of Revolution's Virtual Theatre game engine.

Developed initially for use in the team's previous game, Lure of the Temptress, Virtual Theatre (VT) is a unique game system which effectively simulates a community of characters. Whereas most games tend to treat an

It was originally planned that Beneath a Steel Sky would use the same system as Lure of the Temptress, but a number of improvements were deemed necessary. Charles Cecil, producer of the game and Revolution managing director commented that in the initial version, "there were far too many boxes on screen, which could become confusing, especially when there were multiple conversations taking place. Eventually we decided that the system should be completely enhanced to overcome this, as well as other problems". The new version of VT allows for not only a realistic environment, but also an uncluttered, simple to operate user-interface.

On the graphics front, Dave Gibbons has been an integral part of

"VIRTUAL THEATRE CREATES A WORLD IN WHICH EACH CHARACTER IS UNIQUE AND LEADS THEIR OWN LIFE"

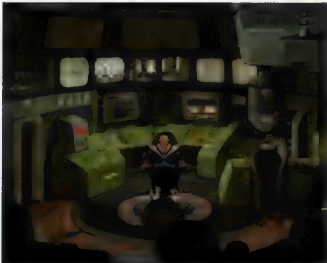
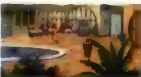
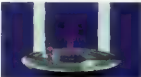
adventure one location at a time, Virtual Theatre creates a world in which each character is unique and leads their own life within the 'world'. Rather than meeting a character in a set location, VT has everyone rambling around getting on with life, and you can meet any of them on any occasion in different places. It certainly adds life to the games and it proved to be very effective in Lure of the Temptress.

the Steel Sky team along with Les Pace, an artist responsible for much of the animation in Who Framed Roger Rabbit? Gibbons sketched out each screen (after consulting the game coders for special gameplay areas and so on) and these were then coloured and scanned into an Apple Mac as a 24-bit 1,000 by 1,000 pixel image with a palette of 25 million colours. These images were then ported to the PC and

PRODUCT
Beneath a Steel Sky
SOFTWARE HOUSE
Virgin
RELEASE DATE
November
REQUIREMENTS
Des 5.0 Min, 2Mb RAM, 386, VGA, Mouse, 20Mb Hard Disk
SUPPORTS
Soundblaster, AdLib, AdLib Gold, Roland Sound Cards



On the ledge you have to throw the grappling hook across, Batman style, to help our hero reach the other side. The animation as he swings across is particularly impressive. Just look at the quality of the backdrop as well. Reaching the other side, Foster crashes through the window into the next part of the adventure



Many of Dave Gibbons' illustrations found throughout the game create a dark and moody atmosphere which conveys the cyberpunk feel exceptionally well. From control rooms to gardens, all the images are superb

**PRE
VIEW**

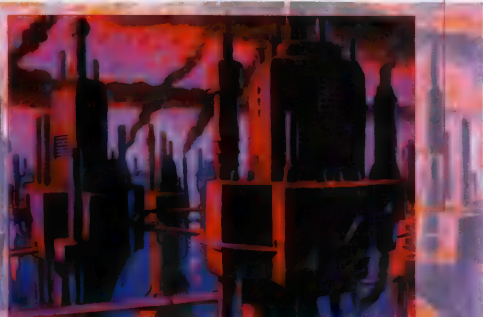
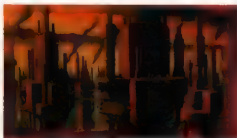
translated to a resolution of 320 by 200 pixels in 256 colours. Once each screen was completed in this way, Les had to touch up each image to compensate for the loss of detail. Game characters are then superimposed over these backdrops for the adventure.

Obviously, having a famed graphic novelist working on the team, Revolution and Virgin were keen to utilise his talents as much as possible. To this end, the game will be accompanied by an in-pack graphic novel to introduce the game characters, and give some kind of background to the story.

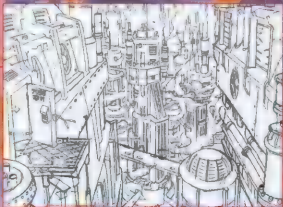
The story is what you'd expect from a cyberpunk-esque mystery. It's set in the future (obviously), where six vast corporations have taken over the world. Between them they've managed to annihilate the Earth's ecological system and now they are the only ones capable of providing suitable habitats in the form of giant city states which cover entire continents – ring a few Megacity bells? Perhaps Judge Dredd is kicking around somewhere?

Anyone declining to live in the cities has to dwell in the wastelands, referred to as the Gap. Robert Foster is a former Gap dweller, but for an unknown reason he has been forced to the city. Here he must come to terms with his own past as he explores the unusual social structure of the city, enforced by LINC which is the all-controlling Big Brother-style computer. The adventure is absolutely huge, and is rich with a wide variety of characters and personalities who inhabit some of the best-looking locations found in an adventure game.

Could this be the adventure game to finally establish British developers as a force to be reckoned with?



Images were drawn by Dave Gibbons before being coloured and digitised by Les Pace. The resulting images initially took advantage of a 25 million colour palette before being reduced to a 320 by 200 pixel image presented in 256 colours.



WHO IS DAVE GIBBONS?



Dave Gibbons is possibly one of the best known comic book artists around. With work spanning from the highly acclaimed *Watchmen*, to *Give Me Liberty* and *2000AD* his work is widely acclaimed by fans of graphic novels. His work on the *Beneath a Steel Sky* project has involved everything from planning individual characters, such as Foster himself, the security force chaps and the Gap Dweller shown here, to all of the locations in the game.

As well as in-game graphics, his talents have been called upon to produce an in-pack graphical novel which covers much of the background to the game's story.



**PRE
VIEW**

THE NEXT GENERATION OF PC ROLE-PLAYING

By

GAMES IS WELL ON THE WAY. STONEKEEP IS SET

John

TO REASSURE INTERPLAY AS A FORCE TO BE

Devotion

RECKONED WITH.



PRODUCT

Stonekeep

SOFTWARE HOUSE

Interplay

RELEASE DATE

February

REQUIREMENTS

One 6.0 Mhz, 4mb Ram, 386 SX,
VGA, CD-ROM Drive

SUPPORTS

Soundblaster, Adlib Sound Cards



**PRE
VIEW**

STONEKEEP



This shot demonstrates just how impressive the graphics get in Stonekeep. The backgrounds glide around most convincingly as real characters attack you from all sides

ROLE-playing games have certainly come a long way in the past couple of years. Since Origin unleashed its revolutionary Underworld game engine, first-person perspective adventures have been thrust into a new age. The storylines are still the same, but we're now bombarded with software company lingo, with terms such as 'virtual reality' and 'total player immersion' being banded about with reckless abandon.

Stonekeep has definitely managed to attract an enormous amount of attention since it was unveiled a few months ago. Boasting a full-screen 3D environment, it takes the systems you'll have previously seen in other games and adds a new degree of reality. How does it do this? The obvious way – by using actors and digitised footage to create a world in which the game takes place. This isn't just the normal, boring old FMV that has been cropping up lately, but a believable blend of computer-generated, rendered

"A COUPLE OF YEARS AGO WE DECIDED WE WANTED TO DO ANOTHER FANTASY ROLE-PLAYING GAME, BUT ONE THAT REALLY SET THE INDUSTRY ON ITS EAR"

dungeons with digitised images superimposed over the top.

Interplay's developers have apparently spent years in creating the product and the line-up of contributors would not look out of place on a movie credit list. Producers, coders, graphic artists, directors and actors have all teamed together to produce something which looks set to help

create new standards in the multimedia game industry. Interplay's pre-launch hype is certainly playing on this fact as it boasts of "Hollywood's top talent...", creating "epic sensations so exciting, you'll feel like you're in a movie". This may be nothing more than enthusiastic hyperbole, but it does illustrate just how excited Interplay is about a potentially ground-breaking product.

Brian Fargo, President of Interplay Productions has stated that, "Stonekeep has to be one of the most ambitious computer titles that we've [Interplay] ever done. When we first started

ear. We looked at all the latest hardware and software available and determined that we wanted to create another title in the genre which we knew best. We're out to recapture the crown for this genre."

Stonekeep producer Michael Quarles commented that, "We did everything we could think of to make Stonekeep as engaging as possible. We removed awkward keyboard commands – you control your movements with just four cursor keys and a mouse. We shot tons of film footage and used blue-screen cinematography to ensure the realism of our effects. The player watches the action unfold on a full-screen monitor – there are no modes to switch between or menus to distract you from the game. We've set up a special auto-mapping feature so you won't need to pull out a sheet of graph paper."

After seeing the game in action, it's brutally obvious that ease of play has been of paramount importance to the development team. The presentation may be the first thing you notice, but it's the fact that it's so easy to adapt to which really makes the difference. It seems that the years of development and research may have paid off.

To add to the sense of realism which the team is trying to achieve, it is also intended that Stonekeep be made compatible with the forthcoming virtual mouse, set to hit the shops this Christmas. Anyone who's played a virtual reality arcade unit will have played around with the joysticks which you simply move around to mimic arm movements. The virtual mouse allows you to wave a special mouse unit around, so you can actually thrust and parry as you attack the hordes of bad guys. It's not something which everyone will necessarily go for, but if you're after the ultimate in realism this will add that little bit extra.

Stonekeep is currently about two-thirds of the way through development, and as long as all goes according to plan, we should be seeing a finished version in time for Christmas, with the UK release currently set for February next year.



The animation on the rendered creatures is especially impressive. The skeletal warriors dash about swiping their swords back and forth, but they do have a certain amount of intelligence



**PRE
VIEW**



Control of your actions is through a series of simple, well-presented, drop-down menus. Simplicity has been a major point of concern with the game's development team



In the top-right you'll notice your party, with the currently active members at the front. Your party is typically comprised of three members, each with different abilities

➤ A really top-class role-playing game isn't worth much without an engrossing storyline to keep you interested, no matter how ground-breaking it may be. Stonekeep begins as the virtuous goddess, There, takes your soul for safe keeping and then sends you on a quest to retrieve the Orbs of Life (Erm, hang on, we're not talking anatomy here are we?) and thwart the Shadow King and

various parts of your anatomy. Orks, skeletal guards, zombies, trolls and faeries (Sorry?) all make an appearance and to make things extra-special difficult they've all been equipped with a rather meaty artificial intelligence which gives them a life of their own. Gone are the days of simply sitting back and beating the crap out of mindless zombies – these guys are a

"THERE ARE ABSOLUTELY LOADS OF GOOD-FOR-NOTHING MEANIES ALL INTENT ON SLITTING YOUR THROAT AND DOING UNSPEAKABLE THINGS TO VARIOUS PARTS OF YOUR ANATOMY"

his legion of evil. Fair enough so far, but where does the king and his legion hang out then? In all there are 13 levels which make up the Shadow King's domain and these range from your everyday dungeon, to sewers, subterranean realms (these are just caves to you and me) and the bad guys' fortress.

On the legion of evil front, there are absolutely loads of good-for-nothing meanies all intent on slitting your throat and doing unspeakable things to

bunch of averagely intelligent creatures capable of developing strategies and working together.

As well as the common dungeon inhabitants there are also some huge guardians kicking around, with the largest we've seen so far being the immense dragon. The development version of the game we saw was yet to have this monstrosity implemented, but from the still visuals we've seen, it looks like it's shaping up to be something special.

ONCE UPON A TIME...

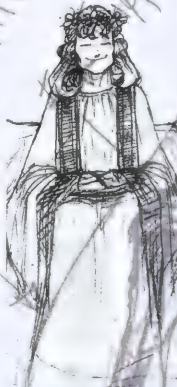
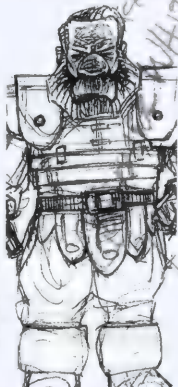
The dragon, in its fully rendered glory. To say that it looks rather impressive would be somewhat of an understatement really. Imagine how this is going to look when it's finally animated. Let's hope you've all got high-powered PCs



**PRE
VIEW**

FROM THE BEGINNING

Every character from the game was planned out at a very early stage before any actors were brought in. These sketches were eventually transformed into costumes, make-up and props which would be used in front of the blue screen. Six actors were used in total, many doubled up as several of the game's unusual inhabitants



THE REAL THING

All of the characters in the game have either been rendered using high-powered graphics packages or, more commonly, they are digitised costumed actors. These pictures were taken on set as each character was filmed in front of a blue screen, performing all of the necessary actions for use in the game. Each character needed to be filmed moving around,

attacking, defending and in their death throws. Once recorded the film was digitised and then superimposed over the rendered backdrops. This method, known as colour separation or overlay, was pioneered years ago in the movies (Star Wars is one notable example) and it allows characters to be used with virtually any background.



THE ACTORS
(From left to right): Scott Laroeca, Brian Tran, Colleen Moroney, a skeleton, Wesley Yonagi, Steve Nguyen and Jacob Buchert III



THE CHARACTERS
(From left to right): Fire guard, Faerie, Orc Shaman, goblin warrior

PREVIEW

FABLES AND FIENDS THE HAND OF FATE

THE SEQUEL TO THE LEGEND OF KYRANDIA

IS HERE - WILL WESTWOOD'S NEW

OFFERING MATCH THE QUALITY OF ITS

PREVIOUS OFFERINGS?

PRODUCT

Fables and Fiends: The Hand of Fate

SOFTWARE HOUSE

Virgin

RELEASE DATE

November

REQUIREMENTS

Des 5.0 Min, 2Mb Ram, 386, VGA, Mouse

SUPPORTS

Soundblaster, Adlib sound cards

FATE

WESTWOOD

Studios is slowly becoming one of "those" development teams. Pretty much every title it has developed has instantly become a classic, with such wonders as Eye of the Beholder (I and II), Dune II and the original Legend of Kyrandia already under its belt. Its latest title comes at a time when the team is at an all-time high with the talents of over 60 professionals, including musicians, artists, animators, illustrators, playwrights and designers all contributing towards new projects. The Hand of Fate is the second in Westwood and Virgin's Fables and Fiends series of adventure games and is being touted as the "largest fantasy adventure game ever created", with "hundreds of hours of gameplay", so Virgin tells us:

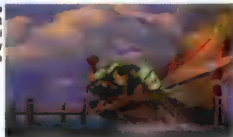
So what's this one all about then? In typical fantasy adventure style, the land of Kyrandia has been cursed and Zanthia, the youngest and most impulsive of the Kyrandian mystics has been called upon to step in and heroically save everybody. You see, it seems that the whole land is slowly disappearing and the only way to prevent this from happening is to place a mystic anchor stone deep in the heart of the world. As you'd expect, there's only one person capable of performing

The scenes throughout the game vary quite dramatically. One moment you can be moving around the murky depths of a worm-infested cavern and later find yourself stuck on the top of a haystack with your skirt stuck to the end of a pitchfork!



There are one hell of a lot of different characters within the land of Kyrandia and each has his or her own little gem of wisdom

See monsters crop up a fair bit throughout the game and all of them are beautifully drawn



The Easter Island Bunny? Oh the wit it'll all! He, no, no, no - thank goodness I were my cursors for I think my sides hath split

PREVIEW



All aspects of the game were sketched out thoroughly and each sagittae of action was storyboarded. Much of Westwood's game design mimics the design process associated with the production of a movie. Writers, illustrators and the game's producer all work together to produce a believable and well-told story for the game.

As with the original Fables game, interaction with other characters is very important. All manner of creatures turn up, from the weird and wacky Hand (a definite Addams Family rip-off if ever I saw one), to the oddball Marko, the clerk in the multicoloured outfit in the screen shots. Pretty much all of the characters will be able to help you along your way, although the odd malevolent little git does turn up from time to time just to throw a spanner in the works when you think everything's going swimmingly.

So what's going to set Hand of Fate apart from the likes of Day of the Tentacle or even the original Kyrandia? For a start there's a heap of new graphical techniques used here which are rarely utilised in point and click adventure games. The new game engine employs a rather snazzy-looking example of graphics scaling which allows you to both manipulate and interact with objects in the game more freely. When you take a look at something, the view zooms in to reveal what it is that you're looking at – hardly a ground-breaking technique, but something which is bound to set a trend for future adventures.

Beyond this, a lot of attention has been paid to the way the game actually looks and sounds. Scenes are lit to illustrate both the time of day and location, whilst it's obvious that an

Such a task, and that just happens to be your role.

As the game begins you step into the shoes of the apparently outrageous (that's what the press release says anyway) Zanthia, who according to our Keith is "a bit of alright really". Your job

"THE LARGEST FANTASY ADVENTURE GAME EVER CREATED WITH HUNDREDS OF HOURS OF GAMEPLAY"

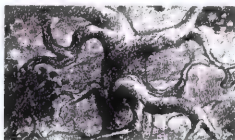
is to travel through the countryside of Kyrandia and eventually find the centre of the world. On your travels you'll traverse many differing landscapes including seashores, swamps, rolling farm land, coastal towns as well as large, previously uncharted Kyrandian realms filled with mysterious creatures.

enormous amount of effort has been put into the music and sampled sound effects.

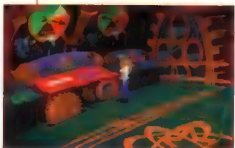
As we put this issue of PC Player to print, Hand of Fate is just going through the very final stages of development and play testing, and is due to be released in mid-November. ■



Believe it or not, this enormous squid is actually...Scottish. Yes, a Gaelic octopus with attitude



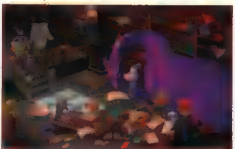
Kyrandia is cursed and all the scholars, wizards and mystics are desperately trying to discover the reason behind the dreadful disappearance of the land



Enter Zanthia – the young, beautiful and rebellious mystic. Could she be the saviour of Kyrandia?



Hand is possibly the most knowledgeable of all the mystics and it is he (she?) who discovers that the land can be secured by means of an anchor stone which must be placed at the centre of the world



The local wizards scour every grimoire and tome to discover the secrets of the anchor stone



Even Marko, well-known local lunatic and all-round top is allowed to partake in the research

**PRE
VIEW**

CYBERPUNK IS BACK IN

FASHION. COULD DREAMWEB

TURN OUT TO BE THE

BLADERUNNER OF PC GAMES?

THE MAGIC OF DREAMS

Trapped in a room with two gun-toting thugs, Ryan summons up a couple of fire-balls with which to reduce the duo to a pile of ash

Blows away! This dream link's better than you at first thought, isn't it? There's nothing quite like making a couple of smug-looking bad guys go up in smoke



DREAMWEB

SINCE

Harrison Ford mumbled his way through the monologues in Ridley Scott's incredible *Bladerunner*, cyberpunk and all its associated imagery has seriously affected modern science fiction. Dreamed up (arguably) by William Gibson in the early eighties, the possibilities of genetically enhanced humans interfacing with computers has fascinated and inspired a new generation of creative minds.

There have been numerous books, impressive role-playing games and dodgy films, but it's not until recently that the games industry has really grabbed the subject by the horns. Many of you will remember the superb Dynamix adventure *Rise of the Dragon*

governments and city officials being weakened by rampant capitalism and huge megacorporations taking over the world, and then goes on to describe the rather mysterious and all-controlling *Dreamweb*. This peculiar force apparently lies deep within the psyche of every living being, binding everyone together in a sort of virtual dream world. The dreaded 'V' word emerges yet again!

Everything would be all smiley and roses if it wasn't for the fact that the *Dreamweb* has been infiltrated by an evil and malevolent force with the sole intent of corrupting the population with bad dreams. Naturally, this is where you come in (bet you saw that one coming a mile off). The guardians of the

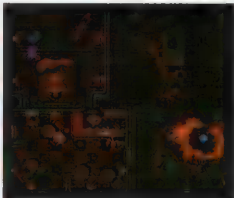
"THE INTENTION THROUGHOUT HAS BEEN TO CREATE SOMETHING AKIN TO BOTH BLADERUNNER AND AKIRA"

which appeared a couple of years ago, but what since then?

This month we've had the pleasure of taking a look at two forthcoming cyberpunk adventures - *Beneath a Steel Sky* featured on page 102 and *Empire's Dreamweb*.

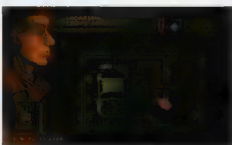
Dreamweb tackles the subject from the tried and tested 'network controlling the world' point of view. The background to the game tells of

Creative Reality was formed four years ago and currently consists of just two people - Neil Dodwell (left in the picture below) who writes all the code, and Dave Dew (right) who's responsible for the graphics. The pair have worked on nearly every machine available, producing more than 15 products between them. Previous achievements include *Myth for System 3*, *Hemesis* and *Warlock for the Spectrum*, plus numerous console conversions including the 8-bit version of *Last Action Hero*. Surprisingly, neither member of the team has any formal training in the field, yet they have collaborated as a team on numerous successful projects



Dreamweb, apparently not doing an awfully good job themselves, summon a single man to break the reign of evil and to ensure that the *Dreamweb* remains intact.

Your control over the whole thing is by means of a simple yet effective icon-driven 'point and click' RPG. Playing the role of Ryan, the chosen one, you must move around the megacity and interact with a wide variety of characters,



You are presented with a wide variety of locations to explore, with everything from bars to darkened garages overflowing with useful objects



Ryan's Deckard-style raincoat seems to be equipped with bottomless pockets. Although at early stages the inventory list is fairly reasonable, later on you get all sorts of junk rambling around in there

PRODUCT

Dreamweb

SOFTWARE HOUSE

Empire

RELEASE DATE

November

REQUIREMENTS

Dos 5.0 Min, 2Mb Ram, 286, VGA, Mouse

SUPPORTS

Soundblaster, Adlib sound cards

spending a great deal of time not only chatting to people, but also hacking, maiming and destroying pretty much anything you come across.

Although at first glance *Dreamweb* appears to be like many other top-down scrolling adventures - Interplay's *Lord of the Rings* springs to mind as a good example - it does employ some interesting new features. Most noteworthy is the zoom effect used when you examine and manipulate items. A small window pops up and shows an enlarged version of whatever you are looking at. This method of exploring eliminates the need for large text windows and tiresome, verbose descriptions.

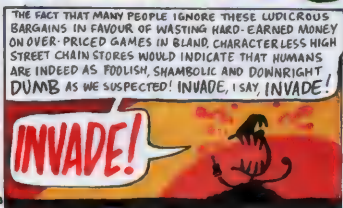
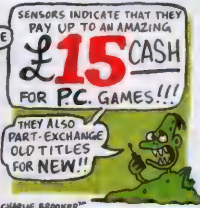
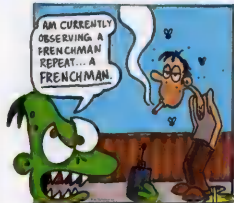
Beyond this effect, the game also boasts 200 rooms spread over 30 different locations, more than 80 different characters to interact with, over 4,000 frames of animation with a frame rate of nearly 70 frames per second on all PCs, plus plenty of sex, violence and naughty language.

Dreamweb's developer, Creative Reality has obviously spent a great deal of time not only generating a large interactive world, but also creating a dark and moody atmosphere to enhance the adventure. The intention throughout has been to produce something akin to both *Bladerunner* and *Akira*, and from the sections we've seen so far it seems that the team has been successful. Creatures use a variety of horrifying weapons to try and subdue you, whilst all kinds of magic begin to emerge from the *Dreamweb*.

It is currently scheduled for release in November, so all being well we should be able to bring you an in-depth review in issue two of PC Player. ■

PRE
VIEW

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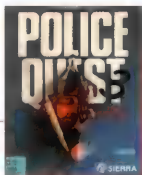
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SPACE QUEST IV

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NEXT
MONTH

So our opening issue of PC Player comes to a close. We've worked long and hard to provide you, our readers, with the best PC gaming magazine on the market. We think we've done quite a good job - the thing is, do you? We want to hear what you thought of PC Player, be it good or bad, and we welcome any comments you care to send us regarding our magazine. Additionally, if you've got any questions you would like to put to our team we will try our best to answer them.

Don't miss out on issue two of PC PLAYER, available from your newsagent on Tuesday 30th November

Three Sixty development team feature

Interview with Westwood Studios

Ultima VIII: Pagan (EA)

Shadowcaster (EA)

Alone In The Dark II (Infogrames)

Inferno (Ocean/DID)

Pacific Strike (EA)

Kingmaker (US Gold)

Aces Over Europe (Dynamix)

Victory At Sea (EA)

Beneath a Steel Sky (Virgin)

SSN-21 Sea Wolf (EA)

**NEXT
MONTH**

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